

7 September 2023

## Testwork Confirms Favourable Flake Size for Lithium Batteries

**Outstanding petrographic analysis results indicate favourable flake size**

### **HIGHLIGHTS**

- **Outstanding results from initial petrographic analysis, indicates graphite flake size of up to 150 micron, highly favourable for battery anode material**
- **Flake sizes of less than 150 micron is preferred for lithium-ion batteries**
  - **Smaller flakes require a lower size reduction, incurring lower cost**
- **Outstanding initial results are a major milestone in de-risking Leliyn's pathway to development**
- **The petrography analysis was conducted on first two diamond drill hole intercepts:**
  - **132m @ 8.7 % TGC from 0m (LEDD\_01)**
    - **incl 94m @ 10.8% TGC from 31m**
  - **126m @ 7.6% TGC from 52m (LEDD\_02)**
    - **incl 53m @ 11.1% TGC from 117m**
- **Composite samples from the recent diamond drilling including the bonanza intersection of 206m @ 10.0% TGC will be submitted for testwork**
- **Maiden Mineral Resource Estimate scheduled to be released in Q1 CY2024**

**Kingsland Minerals Ltd (ASX:KNG)** is pleased to announce successful initial petrographic analysis demonstrating that graphite from its 100% owned Leliyn Graphite Project ("**Leliyn**" or the "**Project**") in the Northern Territory. Leliyn graphite exhibited components of fine, medium and coarse graphite flake, indicating that it is attractive and potentially suitable for use in lithium-ion batteries.

**Kingsland Minerals Managing Director, Richard Maddocks said:**

*"This first batch of thin section petrography shows the graphite flake size at Leliyn is highly suitable for making battery anode material for lithium batteries. These outstanding initial testwork results are a major milestone in de-risking the Project's pathway to development.*

*We are rapidly progressing the maiden Mineral Resource Estimate at Leliyn where mineralisation has been defined over a 5km strike within a 20km long graphitic schist. In parallel, we plan to progress metallurgical flotation test-work.*

*Leliyn is rapidly emerging as a globally significant high-grade, massive scale graphite deposit with favourable characteristics located in the tier-one jurisdiction of the Northern Territory."*

Graphite flakes undergo a micronizing process before being further processed into spherical graphite for use in lithium-ion batteries. Flake sizes of less than 150 micron (100 mesh) are preferred as larger flakes require a greater size reduction which incurs a higher cost. At this early stage Leliyn looks to have flake sizes that are well favourable for battery anode material.

Small samples of core were collected at approximately 7-8m intervals down the core holes for petrographic analysis. This involves making a thin section of the core allowing light to pass through the rock. Polarised light can then be used to identify different mineral species based on the different characteristics of light passing through the slide. The size of individual graphite flakes can also be measured.

Figures 1 and 2 show two such slides from LEDD\_02. The graphite flakes are clearly visible and are a light brown colour. The shape and size of the flakes can also be measured. The view in each photograph is less than 1mm wide so is not representative of the entire intersection but it can be considered indicative of what to expect in larger scale metallurgical test-work. Figure 1 contains flakes up to 220 microns in size and Figure 2 has flakes up to 150 microns. Figure 3 shows fine flake size graphite from LEDD\_01 at 63m. Figure 4 shows the one sample completed in hole LEDD\_03 at 20m depth. This sample shows a concentration of fine flake graphite in a sample averaging 12.5% TGC. The remainder of samples from LEDD\_03 are pending.

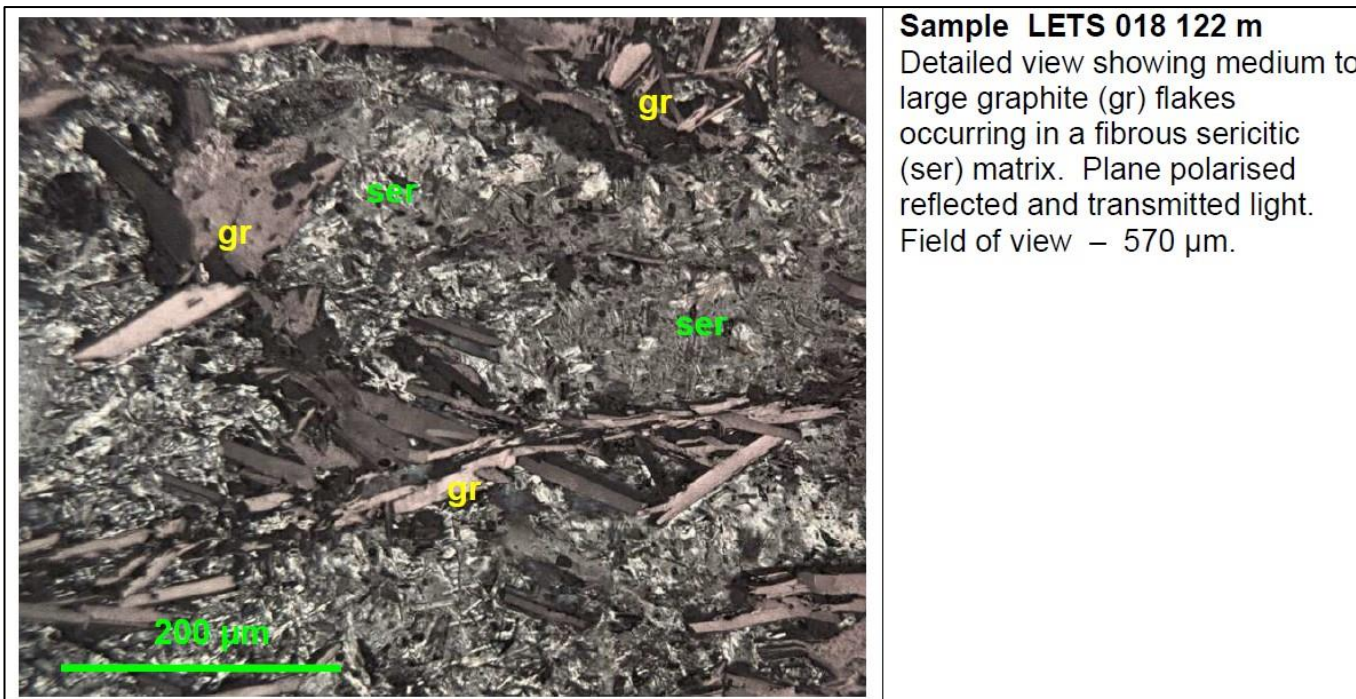
The important conclusion from this analysis is that flake graphite is widespread throughout the drillholes and indicates that Leliyn can be a source of flake graphite. Table 2 summarises the flake size as estimated by the petrographic analyses. A minimum and maximum observed flake size is listed along with an estimated average flake size. LEDD\_01 contains fine flake graphite with flake sizes averaging about 10 to 15 microns with a maximum up to 60 microns. LEDD\_02, located nearly 3km to the west of LEDD\_01, contains a coarser flake size averaging about 30 to 60 microns with a maximum up to 220 microns. Hole TALD001, drilled by previous explorers in 2016, contains flake sizes averaging about 10 to 90 microns with a maximum up to 160 microns. Similar to graphite grade, the flake size is expected to be variable over the deposit. Samples have been submitted for an additional four diamond core holes and these will be announced when received. Diamond drilling is continuing so that more samples can be collected. Figure 5 shows the position of diamond core holes completed to date.

Market commentators and analysts, Benchmark Mineral Intelligence, have made the following comment; "Given sharply rising demand in the face of restricted supply, the graphite market is on track to undergo a deficit in its -100 mesh (150 microns) market, the preferred mesh size for anode manufacturing.<sup>1</sup>" Kingsland is well placed to take advantage of this forecast deficit.

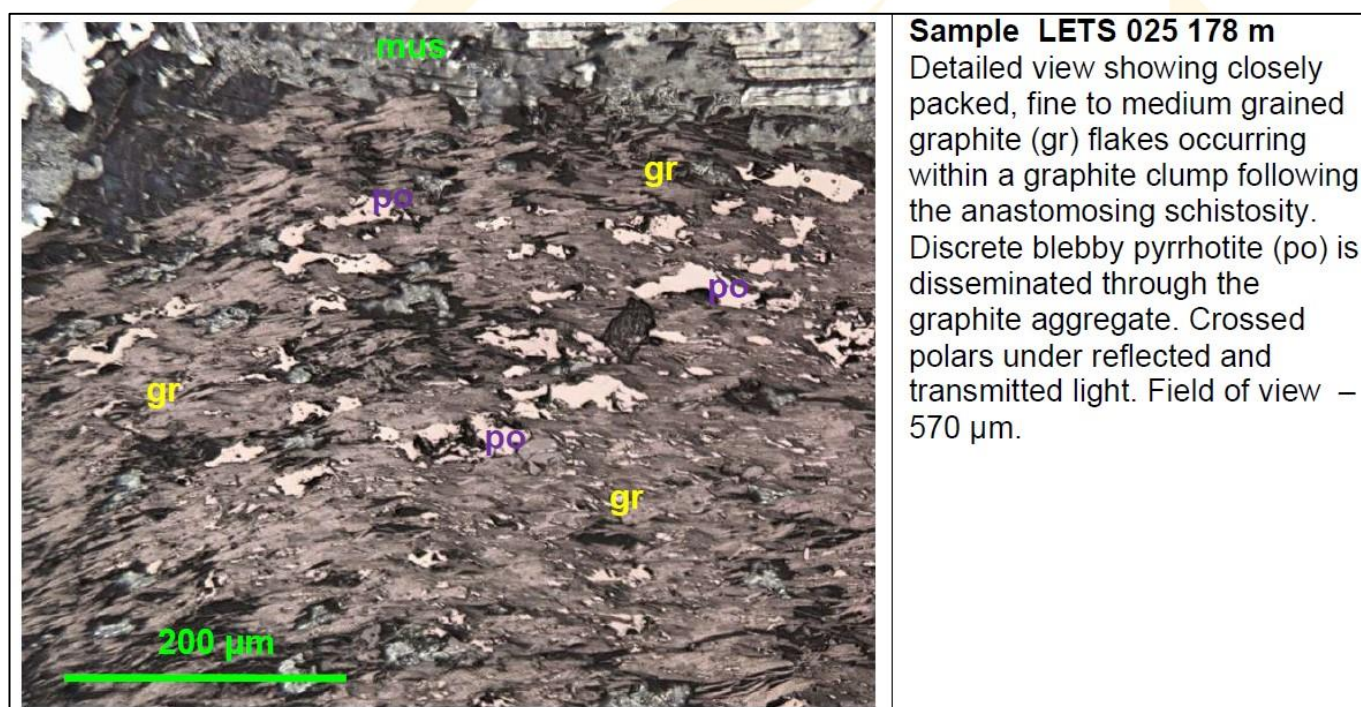
Next steps is to collect representative samples from the diamond drill core and submit these for flotation test-work. The first metallurgical samples are expected to be submitted during September with results taking two to three months. These tests will establish the viability of the graphitic schist to produce a graphite concentrate of a quality that is amenable to further downstream purifying and processing with the targeted final product being purified spherical graphite for use as battery anode material in lithium-ion batteries.

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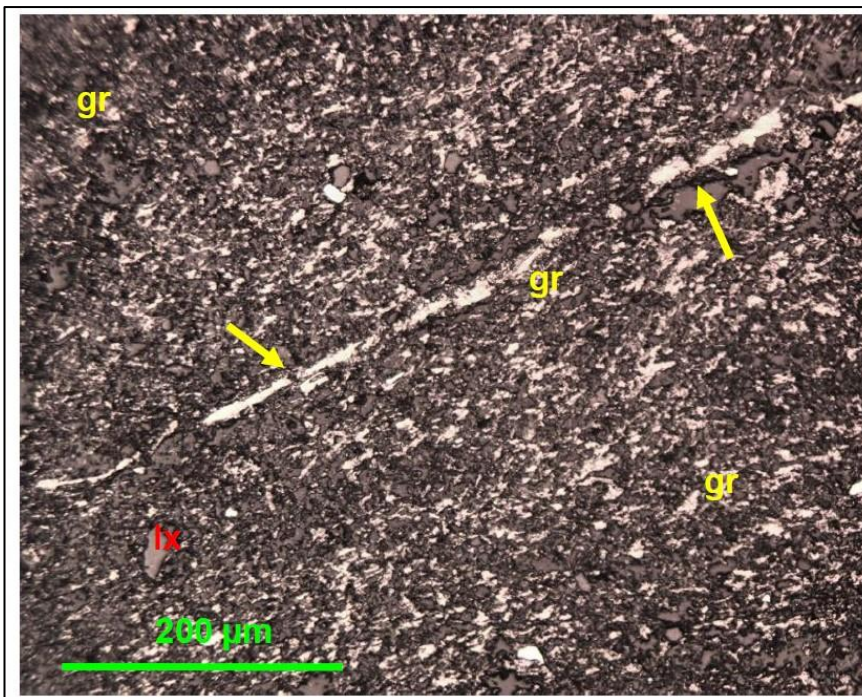
<sup>1</sup> Benchmark Mineral Intelligence, 'What to expect for graphite in 2023?' January 2023  
<https://source.benchmarkminerals.com/article/what-to-expect-for-graphite-in-2023>



**Figure 1: Thin section from LEDD\_02 122m showing graphite flakes up to 220 microns**

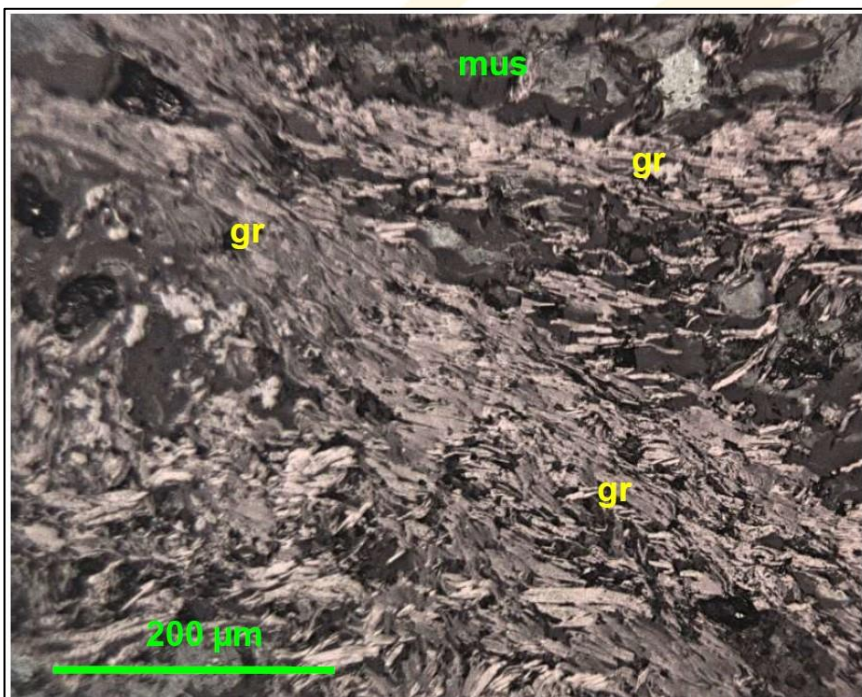


**Figure 2: Thin section from LEDD\_02 178m showing graphite flakes up to 150 microns**



**Sample LETS 004 63 m**  
 Detailed view showing fine flake graphite (gr) parallel to the schistosity in the carbonaceous pelitic host. Coarser grained (up to 40 µm) graphite flakes (arrowed) have been remobilised along a vein that broadly parallels the schistosity. Plane polarised reflected light. Field of view – 570 µm.

**Figure 3: Thin section from LEDD\_01 63m showing fine graphite flakes up to 40 microns**



**Sample LETS 026 20 m**  
 Detailed view showing closely packed, fine grained graphite (gr) flakes occurring within a clump that cross-cuts the muscovite (mus) porphyroblasts. Crossed polars under reflected and transmitted light. Field of view – 570 µm.

**Figure 4: Thin section from LEDD\_03 20m showing fine graphite flakes up to 110 microns**

**Table 1: Summary of Petrographic analysis LEDD\_01, LEDD\_02 and TALD001**

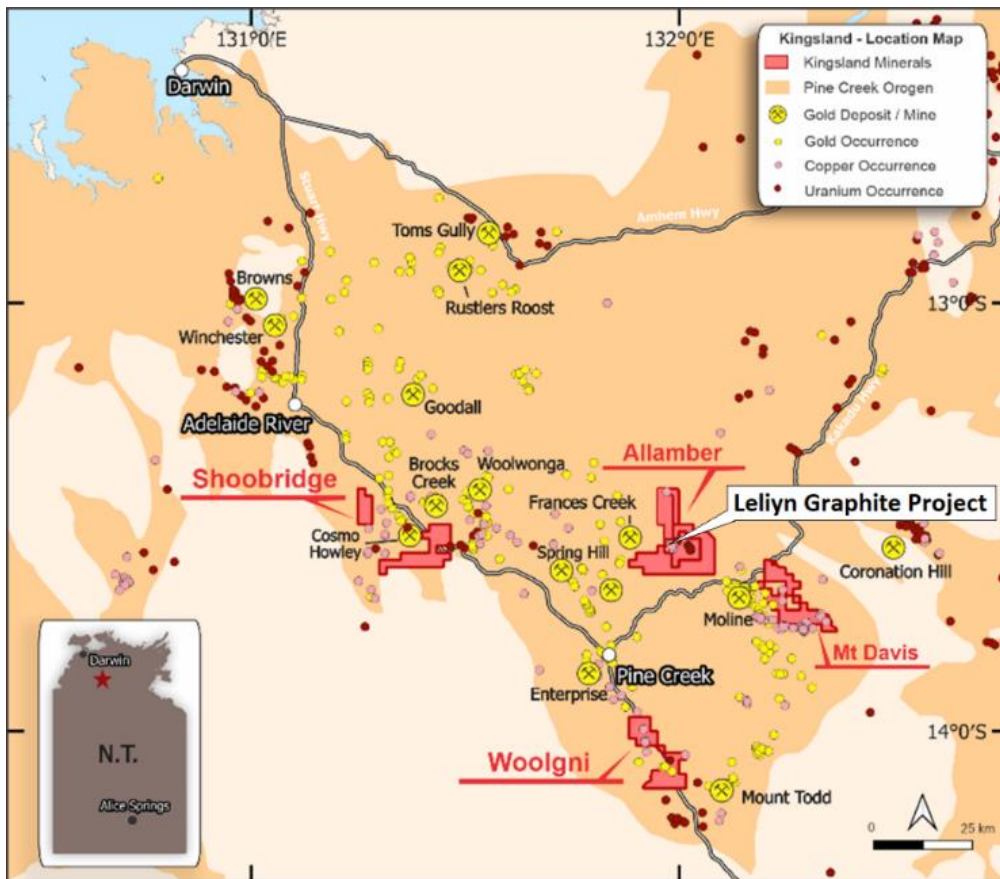
| Hole    | Sample   | Depth (m) | TGC (%) | size from (micron)    | size to (micron) | size avg (micron) |
|---------|----------|-----------|---------|-----------------------|------------------|-------------------|
| LEDD_01 | LETS001  | 39        | 13.17   | 5                     | 65               | 15                |
| LEDD_01 | LETS002  | 47        | 11.39   | 1                     | 35               | 10                |
| LEDD_01 | LETS003  | 55        | 4.77    | 1                     | 5                | 3                 |
| LEDD_01 | LETS004  | 63        | 9.14    | 5                     | 30               | 10                |
| LEDD_01 | LETS005  | 71        | 13.47   | 5                     | 60               | 15                |
| LEDD_01 | LETS006  | 79        | 2.34    | 5                     | 30               | 15                |
| LEDD_01 | LETS007  | 87        | 13.39   | 3                     | 40               | 10                |
| LEDD_01 | LETS008  | 95        | 13.26   | 5                     | 20               | 12                |
| LEDD_01 | LETS009  | 103       | 12.07   | 2                     | 20               | 10                |
| LEDD_01 | LETS010  | 110       | 11.96   | 5                     | 60               | 12                |
| LEDD_01 | LETS011  | 118       | 11.17   | 3                     | 40               | 10                |
| LEDD_01 | LETS012  | 126       | 6.00    | graphite not observed |                  |                   |
| LEDD_01 | LETS013  | 134       | 1.05    | 15                    | 100              | 25                |
| LEDD_02 | LETS014  | 90        | 4.77    | 15                    | 110              | 40                |
| LEDD_02 | LETS015  | 98        | 7.40    | 15                    | 150              | 45                |
| LEDD_02 | LETS016  | 106       | 3.60    | 20                    | 110              | 50                |
| LEDD_02 | LETS017  | 114       | 5.70    | 10                    | 140              | 30                |
| LEDD_02 | LETS018  | 122       | 10.32   | 10                    | 220              | 60                |
| LEDD_02 | LETS019  | 130       | 11.91   | 10                    | 170              | 35                |
| LEDD_02 | LETS020  | 138       | 10.17   | 15                    | 135              | 40                |
| LEDD_02 | LETS021  | 146       | 11.51   | 10                    | 150              | 30                |
| LEDD_02 | LETS022  | 154       | 11.79   | 15                    | 150              | 40                |
| LEDD_02 | LETS023  | 162       | 10.94   | 10                    | 150              | 40                |
| LEDD_02 | LETS024  | 170       | 8.98    | 10                    | 100              | 40                |
| LEDD_02 | LETS025  | 178       | 1.88    | 20                    | 150              | 60                |
| LEDD_03 | LETS026  | 20        | 12.50   | 15                    | 110              | 60                |
| TALD001 | TPOD2766 | 61.6      | 12.4    | 5                     | 90               | 40                |
| TALD001 | TPOD2767 | 97        | 10.5    | 20                    | 120              | 70                |
| TALD001 | TPOD2768 | 110.35    | 13.0    | 20                    | 140              | 70                |
| TALD001 | TPOD2769 | 118.6     | 11.3    | 25                    | 120              | 80                |
| TALD001 | TPOD2770 | 127.95    | 10.6    | 20                    | 110              | 60                |
| TALD001 | TPOD2771 | 136.4     | 12.9    | 6                     | 150              | 80                |
| TALD001 | TPOD2772 | 145.7     | 13.1    | 10                    | 120              | 60                |
| TALD001 | TPOD2773 | 150.6     | 14.6    | 12                    | 130              | 70                |
| TALD001 | TPOD2774 | 153.25    | 12.8    | 12                    | 160              | 90                |
| TALD001 | TPOD2775 | 162.95    | 8.9     | 10                    | 80               | 50                |
| TALD001 | TPOD2776 | 168.95    | 7.8     | 10                    | 60               | 30                |
| TALD001 | TPOD2777 | 179.3     | 5.6     | 20                    | 80               | 50                |
| TALD001 | TPOD2778 | 189.4     | 6.2     | 10                    | 120              | 60                |
| TALD001 | TPOD2779 | 195.9     | 13.8    | 10                    | 120              | 60                |
| TALD001 | TPOD2780 | 216.8     | 17.4    | 5                     | 20               | 10                |
| TALD001 | TPOD2781 | 225.5     | 13.0    | 3                     | 20               | 10                |
| TALD001 | TPOD2782 | 240.55    | 11.9    | 3                     | 40               | 20                |
| TALD001 | TPOD2783 | 246.65    | 11.4    | 2                     | 80               | 30                |



**Figure 5: Plan showing location of diamond drillhole completed to date**

**Table 2: Details of Leliyn Drilling**

| Hole      | Type | East MGA52  | North MGA52 | RL  | Dip | Azi | Depth  |
|-----------|------|-------------|-------------|-----|-----|-----|--------|
| LEDD_01   | DDH  | 825395      | 8499428     | 124 | -70 | 195 | 149.6  |
| LEDD_02   | DDH  | 822614      | 8499882     | 139 | -60 | 190 | 182.39 |
| LEDD_03   | DDH  | 822393      | 8499941     | 139 | -60 | 220 | 124    |
| LEDD_04   | DDH  | 822280      | 8500099     | 147 | -60 | 335 | 362.56 |
| LEDD_05   | DDH  | 822229      | 8500058     | 161 | -60 | 335 | 262    |
| LEDD_06   | DDH  | 824678      | 8499593     | 128 | -60 | 180 | 155    |
| TALD001   | DDH  | 822919      | 8499685     | 157 | -65 | 0   | 249.1  |
| TAL130RC  | RC   | 822922      | 8499920     | 131 | -60 | 180 | 360    |
| LEDDRC_01 | RC   | 825215      | 8499428     | 123 | -60 | 180 | 54     |
| LEDDRC_02 | RC   | 825339      | 8499459     | 118 | -60 | 180 | 78     |
| LERC_01   | RC   | 824851      | 8499519     | 119 | -60 | 180 | 90     |
| LERC_02   | RC   | 825202      | 8499426     | 124 | -60 | 180 | 72     |
| LERC_03   | RC   | 825014      | 8499484     | 124 | -60 | 180 | 54     |
| LERC_04   | RC   | 825208      | 8499375     | 129 | -60 | 180 | 84     |
| LERC_05   | RC   | not drilled |             |     |     |     |        |
| LERC_06   | RC   | 825395      | 8499398     | 126 | -60 | 180 | 96     |
| LERC_07   | RC   | 824587      | 8499524     | 138 | -60 | 180 | 36     |
| LERC_08   | RC   | 825395      | 8499426     | 124 | -60 | 180 | 102    |
| LERC_09   | RC   | 822455      | 8499945     | 136 | -60 | 225 | 120    |
| LERC_10   | RC   | 822396      | 8499893     | 147 | -60 | 225 | 150    |
| LERC_11   | RC   | 822557      | 8499850     | 140 | -60 | 180 | 150    |
| LERC_12   | RC   | 822565      | 8499923     | 135 | -60 | 180 | 138    |
| LERC_13   | RC   | 822562      | 8499876     | 138 | -60 | 185 | 150    |
| LERC_14   | RC   | 822614      | 8499880     | 139 | -60 | 180 | 204    |
| LERC_15   | RC   | 822563      | 8499826     | 141 | -60 | 180 | 90     |
| LERC_16   | RC   | 822562      | 8499795     | 145 | -60 | 185 | 54     |
| LERC_17   | RC   | 822391      | 8499943     | 139 | -60 | 235 | 174    |
| LERC_18   | RC   | 822656      | 8499866     | 139 | -60 | 184 | 174    |
| LERC_19   | RC   | 824678      | 8499590     | 128 | -60 | 187 | 114    |
| LERC_20   | RC   | 825009      | 8499488     | 124 | -60 | 180 | 42     |
| LERC_21   | RC   | 824680      | 8499536     | 129 | -60 | 180 | 102    |
| LERC_22   | RC   | 824678      | 8499637     | 124 | -60 | 185 | 114    |
| LERC_23   | RC   | 824282      | 8499570     | 131 | -60 | 185 | 60     |
| LERC_24   | RC   | 824287      | 8499612     | 129 | -60 | 185 | 60     |
| LERC_25   | RC   | 825014      | 8499477     | 125 | -60 | 180 | 60     |
| LERC_26   | RC   | 824376      | 8499620     | 131 | -60 | 180 | 78     |
| LERC_27   | RC   | 825136      | 8499457     | 126 | -60 | 180 | 60     |
| LERC_28   | RC   | 822613      | 8499819     | 146 | -60 | 180 | 174    |
| LERC_29   | RC   | 822173      | 8500242     | 149 | -60 | 215 | 174    |
| LERC_30   | RC   | 822100      | 8500210     | 161 | -90 | 0   | 132    |
| LERC_31   | RC   | 821357      | 8501091     | 144 | -60 | 260 | 138    |
| LERC_32   | RC   |             |             |     |     |     |        |



**Figure 6: Kingsland Minerals Northern Territory Exploration Projects**

THIS ANNOUNCEMENT HAS BEEN AUTHORISED FOR RELEASE ON THE ASX BY THE COMPANY'S BOARD OF DIRECTORS

### About Kingsland Minerals Ltd

Kingsland Minerals Ltd is an exploration company with assets in the Northern Territory and Western Australia. Kingsland's focus is exploring the Leliyn Graphite Project in the Northern Territory. The Company is confident that Leliyn has significant potential, as shown by the substantial Exploration Target of 200-250 million tonnes grading 8-11 per cent Total Graphitic Carbon (TGC) for contained graphite of 16-27Mt. **The potential quantity and grade of an exploration target is conceptual in nature, there has been insufficient exploration to determine a mineral resource and there is no certainty that further exploration work will result in the determination of mineral resources or that the production target itself will be realised.** The Exploration Target is based on a graphitic schist measuring 5km long, 200m deep and 100m wide. The 5km strike length of the schist sits within a longer 20km-long graphitic schist. The initial exploration program will focus on the 5km stretch which hosts the Exploration Target. This will underpin a maiden JORC Resource. Kingsland believes there is also significant exploration potential within the remaining 15km of graphitic schist.



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Richard Maddocks: Managing Director

Bruno Seneque: Director/Company Secretary

Nicholas Revell: Technical Director

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## **Competent Persons Statement**

*The information in this report that relates to Exploration Results is based on information compiled by Richard Maddocks, a Competent Person who is a Fellow of The Australasian Institute of Mining and Metallurgy. Richard Maddocks has sufficient experience that is relevant to the style of mineralisation and type of deposit under consideration and to the activity being undertaken to qualify as a Competent Person as defined in the 2012 Edition of the 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves'. Richard Maddocks consents to the inclusion in the report of the matters based on his information in the form and context in which it appears. Richard Maddocks is a full time employee of Kingsland Minerals Ltd and holds securities in the company.*

*The information in this announcement referring to the Leliyn Exploration Target is extracted from the report entitled 'Graphite Exploration Target' created on March 21 2023 and available to view on [www.kingslandminerals.com.au](http://www.kingslandminerals.com.au), or on the ASX website [www.asx.com.au](http://www.asx.com.au) under ticker code KNG. The company confirms that it is not aware of any new information or data that materially affects the information included in the original market announcement and in the case of estimates of Mineral Resources or Ore Reserves, that all material assumptions and technical parameters underpinning the estimates in the relevant market announcement continue to apply and have not materially changed. The company confirms that the form and context in which the Competent Person's findings are presented have not been materially modified from the original market announcement.'*

*The information in this announcement referring to the Exploration Results for holes LEDD\_01 and LEDD\_02 is extracted from the report entitled 'Diamond core assays confirm high grades over big widths' created on 22 August 2023 and available to view on [www.kingslandminerals.com.au](http://www.kingslandminerals.com.au), or on the ASX website [www.asx.com.au](http://www.asx.com.au) under ticker code KNG. The company confirms that it is not aware of any new information or data that materially affects the information included in the original market announcement and in the case of estimates of Mineral Resources or Ore Reserves, that all material assumptions and technical parameters underpinning the estimates in the relevant market announcement continue to apply and have not materially changed. The company confirms that the form and context in which the Competent Person's findings are presented have not been materially modified from the original market announcement.'*

## JORC Tables

### Section 1: Sampling Techniques and Data Leliyn Graphite Project

| Criteria                     | JORC Code explanation                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              | Commentary                                                                                                                                                                                                                                                                                                                                             |
|------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Sampling techniques</b>   | <ul style="list-style-type: none"> <li>Nature and quality of sampling (eg cut channels, random chips, or specific specialised 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.</li> <li>Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.</li> <li>Aspects of the determination of mineralisation that are Material to the Public Report. 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.</li> </ul> | <ul style="list-style-type: none"> <li>RC drilling samples were collected as 1m intervals via a riffle splitter off the drill rig.</li> <li>Diamond core is cut in half</li> <li>Samples for thin section analysis were collected from half core about every 7-8m down the core hole. A small section of core about 10cm long was collected</li> </ul> |
| <b>Drilling techniques</b>   | <ul style="list-style-type: none"> <li>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).</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              | <ul style="list-style-type: none"> <li>RC drilling techniques were used.</li> <li>Diamond drilling is HQ size</li> </ul>                                                                                                                                                                                                                               |
| <b>Drill sample recovery</b> | <ul style="list-style-type: none"> <li>Method of recording and assessing core and chip sample recoveries and results assessed.</li> <li>Measures taken to maximise sample recovery and ensure representative nature of the samples.</li> <li>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.</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | <ul style="list-style-type: none"> <li>RC drilling sample recoveries are considered to be high</li> <li>Core recoveries are generally at 100% except for fault zones</li> </ul>                                                                                                                                                                        |
| <b>Logging</b>               | <ul style="list-style-type: none"> <li>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.</li> <li>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.</li> <li>The total length and percentage of the relevant intersections logged.</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | <ul style="list-style-type: none"> <li>All drilling was qualitatively geologically logged recording lithology, mineralisation colour, weathering and grain size.</li> </ul>                                                                                                                                                                            |

| Criteria                                              | JORC Code explanation                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | Commentary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
|-------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Sub-sampling techniques and sample preparation</b> | <ul style="list-style-type: none"> <li>• <i>If core, whether cut or sawn and whether quarter, half or all core taken.</i></li> <li>• <i>If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.</i></li> <li>• <i>For all sample types, the nature, quality and appropriateness of the sample preparation technique.</i></li> <li>• <i>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</i></li> <li>• <i>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.</i></li> <li>• <i>Whether sample sizes are appropriate to the grain size of the material being sampled.</i></li> </ul> | <ul style="list-style-type: none"> <li>• Sample preparation was conducted at Northern Assay Laboratories in Pine Creek</li> <li>• Samples were delivered to North Australian Laboratories at Pine Creek for analysis</li> <li>• Samples are dried at 120 C for a minimum of four hours [or over-night if samples are excessively wet]. Sample prep is jaw crushing whole sample through a Boyd double toggle jaw crusher to a nominal 2mm particle size, splitting 400 gram through a jones riffle splitter and fine pulverising to 75 micron through an LM2 pulveriser. A barren washed creek sand as a barren flush is pulverised after every sample</li> <li>• Total Graphitic Carbon is analysed with a weak acid digestion followed by a 420°C roast and then final analysis in a CS analyser</li> <li>• A suite of multi-elements was also assayed using a 4-acid digest followed by ICP-MS</li> </ul> |
| <b>Quality of assay data and laboratory tests</b>     | <ul style="list-style-type: none"> <li>• <i>The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.</i></li> <li>• <i>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.</i></li> <li>• <i>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.</i></li> </ul>                                                                                                        | <ul style="list-style-type: none"> <li>• Internal QAQC by the laboratory indicate no sampling or bias issues.</li> <li>• The assay technique is considered appropriate for the style of mineralisation and results in a total analysis of graphitic carbon.</li> <li>• Standards and field duplicates are submitted as part of the drilling program</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| <b>Verification of sampling and assaying</b>          | <ul style="list-style-type: none"> <li>• <i>The verification of significant intersections by either independent or alternative company personnel.</i></li> <li>• <i>The use of twinned holes.</i></li> <li>• <i>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</i></li> <li>• <i>Discuss any adjustment to assay data.</i></li> </ul>                                                                                                                                                                                                                                                                                                                                                                                    | <ul style="list-style-type: none"> <li>• Assays have been verified by company geologists.</li> <li>• Some diamond core holes have been drilled as twins to RC holes</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| <b>Location of data points</b>                        | <ul style="list-style-type: none"> <li>• <i>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.</i></li> <li>• <i>Specification of the grid system used.</i></li> <li>• <i>Quality and adequacy of topographic control.</i></li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                       | <ul style="list-style-type: none"> <li>• Drill holes were initially surveyed with a hand held GPS with +/- 5m accuracy. After drilling Cross Solutions of Darwin surveyed the collar location with DGPS to close accuracy</li> <li>• The project areas lies at the boundary between MGA zones 52 and 53 so GPS co-ordinates are sometimes reported in these different grids depending where drill holes lie. The default grid to use in computer software to enable all holes to be plotted on the same grid co-ordinates will be MGAZ52</li> </ul>                                                                                                                                                                                                                                                                                                                                                          |

| Criteria                                                       | JORC Code explanation                                                                                                                                                                                                                                                                                                                                                                                                                | Commentary                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
|----------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Data spacing and distribution</b>                           | <ul style="list-style-type: none"> <li>• Data spacing for reporting of Exploration Results.</li> <li>• 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.</li> <li>• Whether sample compositing has been applied.</li> </ul>                               | <ul style="list-style-type: none"> <li>• Drill spacing is designed on 200m spacing with about 50m spacing along drill lines. Some lines to the west of the project have been drilled at 50m spacing to assess shorter range variability in geology and grade</li> <li>• The data at this stage is only being used to establish the width and orientation of the graphitic schists. Additional drilling will be required to estimate Mineral Resources</li> </ul> |
| <b>Orientation of data in relation to geological structure</b> | <ul style="list-style-type: none"> <li>• Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.</li> <li>• If the relationship between the drilling orientation and the orientation of key mineralised structures is considered to have introduced a sampling bias, this should be assessed and reported if material.</li> </ul> | <ul style="list-style-type: none"> <li>• Drilling is generally perpendicular to the strike direction of then graphitic schists.</li> </ul>                                                                                                                                                                                                                                                                                                                       |
| <b>Sample security</b>                                         | <ul style="list-style-type: none"> <li>• The measures taken to ensure sample security.</li> </ul>                                                                                                                                                                                                                                                                                                                                    | <ul style="list-style-type: none"> <li>• Samples are taken to the assay lab in Pine Creek by Kingsland personnel.</li> </ul>                                                                                                                                                                                                                                                                                                                                     |
| <b>Audits or reviews</b>                                       | <ul style="list-style-type: none"> <li>• The results of any audits or reviews of sampling techniques and data.</li> </ul>                                                                                                                                                                                                                                                                                                            | <ul style="list-style-type: none"> <li>• No audits or reviews of sampling techniques have been undertaken.</li> </ul>                                                                                                                                                                                                                                                                                                                                            |

## Section 2: Reporting of Leliyn Graphite Project Exploration Results

| Criteria                                       | JORC Code explanation                                                                                                                                                                                                                                                                                                                                                                                                                                                                | Commentary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Mineral tenement and land tenure status</b> | <ul style="list-style-type: none"> <li>• 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.</li> <li>• The security of the tenure held at the time of reporting along with any known impediments to obtaining a license to operate in the area.</li> </ul> | <ul style="list-style-type: none"> <li>• The Leliyn Graphite Project is located on tenements EL 31960 and EL 32152. These tenements are 100% owned by Kingsland Minerals Ltd. There are no known encumbrances to conducting exploration on these tenements.</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| <b>Exploration done by other parties</b>       | <ul style="list-style-type: none"> <li>• Acknowledgment and appraisal of exploration by other parties.</li> </ul>                                                                                                                                                                                                                                                                                                                                                                    | <ul style="list-style-type: none"> <li>• There has been an extensive history of exploration for uranium and copper over the past 40 years. There has however been only limited work done focussed on graphite. Thundelarra Exploration (now Ora Gold Ltd) sampled some holes in 2012 for graphite at their Hatrick copper prospect and Cleo uranium prospect. These samples indicated the presence of significant grade and thickness of graphite mineralisation measured as total graphitic carbon (TGC). In 2017 one diamond drill hole TALD001 was drilled into the graphitic schist and sampled for TGC. Significant grades and widths of graphite mineralisation were encountered. Samples from TALD001 were submitted to Pathfinder Exploration Pty Ltd for thin section petrographical analysis.</li> </ul> |

| Criteria                                                                | JORC Code explanation                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | Commentary                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|-------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Geology</b>                                                          | <ul style="list-style-type: none"> <li>• Deposit type, geological setting and style of mineralisation.</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    | <ul style="list-style-type: none"> <li>• Carbonaceous sediments of the Masson Formation have been contact metamorphosed by the Cullen Granites. This has metamorphosed carbon to graphite and converted shales to schists .</li> <li>• This contact extends for about 20 km within Kingsland's tenement package.</li> </ul>                                                                                                                       |
| <b>Drill hole information</b>                                           | <ul style="list-style-type: none"> <li>• 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: <ul style="list-style-type: none"> <li>• easting and northing of the drill hole collar</li> <li>• elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar</li> <li>• dip and azimuth of the hole</li> <li>• down hole length and interception depth</li> <li>• hole length</li> </ul> </li> <li>• 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.</li> </ul> | <ul style="list-style-type: none"> <li>• Drilling information is included in this announcement</li> <li>• RC and core holes are surveyed downhole with a single shot camera. It is apparent that magnetic minerals, likely pyrrhotite, do interfere with azimuth readings. Obviously erroneous readings are disregarded</li> <li>• Deeper diamond core holes are surveyed with a gyro tool to eliminate in impact of magnetic readings</li> </ul> |
| <b>Data aggregation methods</b>                                         | <ul style="list-style-type: none"> <li>• In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (e.g. cutting of high grades) and cut-off grades are usually Material and should be stated.</li> <li>• Where aggregate intercepts incorporate short 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.</li> <li>• The assumptions used for any reporting of metal equivalent values should be clearly stated.</li> </ul>                                                                                                                                                                                  | <ul style="list-style-type: none"> <li>• Assays are reported as weighted average intersections.</li> <li>• Intervals have been reported at a cut-off grade of 2% TGC with a maximum of 4m of internal dilution.</li> </ul>                                                                                                                                                                                                                        |
| <b>Relationship between mineralisation widths and intercept lengths</b> | <ul style="list-style-type: none"> <li>• These relationships are particularly important in the reporting of Exploration Results.</li> <li>• If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.</li> <li>• If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (e.g. 'down hole length, true width not known').</li> </ul>                                                                                                                                                                                                                                                                                                                                                              | <ul style="list-style-type: none"> <li>• Drilling has been perpendicular to the strike direction. The true width of mineralisation will vary but is generally expected to be from 70% to 80% of the reported down-hole widths.</li> </ul>                                                                                                                                                                                                         |
| <b>Diagrams</b>                                                         | <ul style="list-style-type: none"> <li>• 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.</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               | <ul style="list-style-type: none"> <li>• Relevant diagrams have been included within the main body of text.</li> </ul>                                                                                                                                                                                                                                                                                                                            |
| <b>Balanced Reporting</b>                                               | <ul style="list-style-type: none"> <li>• Accuracy and quality of surveys used to locate drill holes (collar and down-</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     | <ul style="list-style-type: none"> <li>• The competent person deems the reporting of these drill results to be</li> </ul>                                                                                                                                                                                                                                                                                                                         |

| Criteria                                  | JORC Code explanation                                                                                                                                                                                                                                                                                                                                                                                                                   | Commentary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
|-------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
|                                           | <p>hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation.</p> <ul style="list-style-type: none"> <li>Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced avoiding misleading reporting of Exploration Results.</li> </ul>                                                      | <p>balanced.</p>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| <b>Other substantive exploration data</b> | <ul style="list-style-type: none"> <li>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.</li> </ul> | <ul style="list-style-type: none"> <li>RC and diamond drilling will progress at Leliyn ultimately aimed at the estimation of a Mineral Resource.</li> <li>Diamond drill samples will be used for metallurgical test work to determine flotation characteristics and the suitability of Leliyn graphite for battery end uses.</li> <li>There is no other substantive data to report. Exploration at Leliyn is at an early stage with only limited historical exploration data relevant to graphite mineralisation.</li> </ul> |
| <b>Further work</b>                       | <ul style="list-style-type: none"> <li>The nature and scale of planned further work (e.g. tests for lateral extensions or depth extensions or large-scale step-out drilling).</li> <li>Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.</li> </ul>                                     | <ul style="list-style-type: none"> <li>Diamond drill samples will be used for metallurgical test work to determine flotation characteristics and the suitability of Leliyn graphite for battery end uses.</li> </ul>                                                                                                                                                                                                                                                                                                         |