



## ASX ANNOUNCEMENT

2 December 2019

### First samples collected from highly prospective Lake Throssell and new tenements applications double the Project area

- **Lake Throssell Sulphate of Potash Project**

- Heritage survey completed.
- Hand-auger sampling targeting near-surface brines conducted.
  - **Auger holes rapidly filled with brine from 30 to 70cm below surface** with abundant gypsum indicating the brine is saturated in sulphate.
  - 35 samples from 16 locations collected for analysis from across the lake surface with assay results expected in Q3 FY20.
- **Two new tenement applications** that cover approximately 434km<sup>2</sup> along the northern and southern extensions of the interpreted underlying palaeochannel, **securing the Lake Throssell system and taking the Project area to 752km<sup>2</sup>**.  
The next phase of exploration to target the basal sand aquifer of the palaeochannel.

- **Laverton Links Sulphate of Potash Project**

- Ground gravity surveys completed at both Lake Hope Campbell and East Laverton.
- 20 exploration drill holes completed for 1,463m of air core drilling at Lake Hope Campbell.
  - **Palaeochannel sediments encountered throughout the tenement extent, basal sand and gravel present at up to 40m in thickness with strong brine flows from airlifts.**
  - Assay results expected early in Q3 FY20.
- Aircore drilling now underway at Lake Rason with results expected in Q3 FY20.
- **Initial JORC Mineral Resource estimates anticipated Q3 FY20.**

Trigg Mining Limited (ASX: TMG) (Trigg or the Company) has completed three significant in-field exploration milestones at its two Sulphate of Potash (SOP) Projects near Laverton in Western Australia, just weeks after listing on the ASX. The completion of the heritage survey with the Ngaanyatjarra traditional owners at the Lake Throssell SOP Project paved the way for the very first SOP sampling program across Lake Throssell with results expected early in the next quarter. The early positive signs of the potential mineralisation have led the Company to apply for two additional tenements to the north and the south of Lake Throssell along the interpreted underlying palaeochannels, securing the palaeo-system and taking the Project area to 752km<sup>2</sup>. The results from the sampling program are expected early next quarter.

At Laverton Links the first drilling program at Lake Hope Campbell has also been completed with 1463m of air core drilling across 20 holes testing the entire 100km of the palaeochannel. Drilling targeted the gravity lows detected by the recently completed ground gravity survey in combination with the existing publicly available aerial electromagnetic (AEM) survey. The drilling encountered traditional Goldfields style palaeovalley sediments including a lacustrine clay aquitard up to 50m thick and basal sand and gravel aquifer beneath the clay up to 40m thick.

The drill rig has now moved to Lake Rason where 500 m of drilling is planned to supplement the previous air core drilling results and will allow for an initial Mineral Resource estimate to be calculated.

### **Lake Throssell Sulphate of Potash Project**

The Lake Throssell Sulphate Potash Project (**Lake Throssell**) lies approximately 200km east of Laverton along the Great Central Road (through to Queensland) and covers approximately 752km<sup>2</sup> of tenements including the Lake Throssell playa lake and underlying palaeochannel. In 2017 Trigg and the Ngaanyatjarra traditional owners entered into an exploration access agreement and under this agreement a heritage survey has now been completed paving the way forward for on-ground exploration activities.

Reconnaissance sampling was completed immediately after the heritage survey, collecting the very first brine samples from the lake to determine the tenor of the brine throughout the surface aquitard. A hand auger was used to establish pits up to 2m in depth and free-flowing brine was encountered 30 – 70cm below surface in all 16 pits (Figures 1 and 2 and Table 1). 35 samples were taken for analysis with results expected early in Q3 FY20.

Abundant gypsum was encountered over the lake area (Figure 1), indicating super-saturation of sulphates and is considered a good early indicator of the potential of the mineralisation within the brine. This observation also confirms the ASTER satellite gypsum index imagery across the lake surface (Figure 2).

With such strong indication of the potential for mineralisation across the Lake Throssell area, the Company has applied for two additional tenements along the interpreted underlying palaeochannel to the north and south, securing the Lake Throssell palaeo-system. Together these tenements cover an additional 434km<sup>2</sup> of potential SOP mineralisation (Figure 3), taking the Lake Throssell Project area to 752km<sup>2</sup>.

The next phase of exploration at Lake Throssell will target the palaeochannel and the basal sand aquifers.

### **Laverton Links Sulphate of Potash Project**

#### **Lake Hope Campbell**

The first air core drilling program at Lake Hope Campbell has been completed with 1463m drilled across 20 holes (Table 2), testing the entire 100 km strike length of the tenement area. Drilling targeted the gravity lows detected by the recently completed ground gravity survey in combination with the existing publicly available AEM survey. Three drill transects were completed over the palaeovalley sequence to confirm the geometry of the channel sediments, additional single drill holes were completed on the remaining gravity lines and AEM targets where accessible. The drilling encountered traditional Goldfields style palaeovalley sediments including

a lacustrine clay aquitard up to 50m thick and basal sand and gravel aquifer beneath the clay up to 40m thick. The end of holes typically encountered a granitic basement with an overlying weathered profile.

Brine and lithological samples will be submitted for analysis with results expected early in Q3 FY20.

**Managing Director, Keren Paterson commented,** *“In just a few weeks since listing we have completed multiple significant milestones. At Lake Throssell - a heritage survey, reconnaissance sampling and additional tenement applications covering the Lake Throssell system have been completed. At Laverton Links we’ve finished the first drilling program at Lake Hope Campbell which encountered multiple intersections of up to 40m of basal sands and gravels. Assay results for the sampling programs are expected next quarter and initial mineral resource estimates to follow.*

*I would like to take this opportunity to extend our gratitude to the of the Ngaanyatjarra, traditional owners of Lake Throssell, for their support in helping us to achieve the heritage clearance and for the cultural exchange we experienced.*

*The field program will continue over the next few weeks with further drilling planned at Lake Rason and East Laverton and I look forward to keeping the market up to date on our rapid progress across both Projects with assay results and initial mineral resource estimates due next quarter.”*

#### **Trigg Mining Limited**



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#### **About Trigg Mining**

Trigg Mining is looking to secure Australia’s sustainable agriculture future through the exploration of essential potassium fertiliser, sulphate of potash (**SOP**), necessary for global food production and human nutrition. SOP provides essential macro nutrients for plant growth without any detrimental elements, such as chloride found in muriate of potash (**MOP**). In addition, SOP can be produced sustainably through the solar evaporation of potassium-rich hypersaline brine water, without the need for large open pits or waste-rock dumps.

The Trigg Mining SOP Projects (Figure 2) are located nearby established energy and transport infrastructure for access to Australian and international agricultural markets, approximately 200 km east of Laverton in WA and include a JORC Compliant Exploration Target. The Projects cover more than 3,000 km<sup>2</sup> and contain over 400 km<sup>2</sup> of salt lake playa and 300 km of interpreted palaeochannels (ancient underground rivers) all highly prospective for brine hosted SOP.

### Competent Persons' Statements

The information in this announcement that relates to exploration results is based upon information compiled by Mr Neil Inwood, as Trigg's Technical Manager. Mr Inwood is a Fellow of the Australasian Institute of Mining and Metallurgy and has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking 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". Mr Inwood consents to the inclusion in this ASX announcement of the matters based upon the information in the form and context in which it appears.

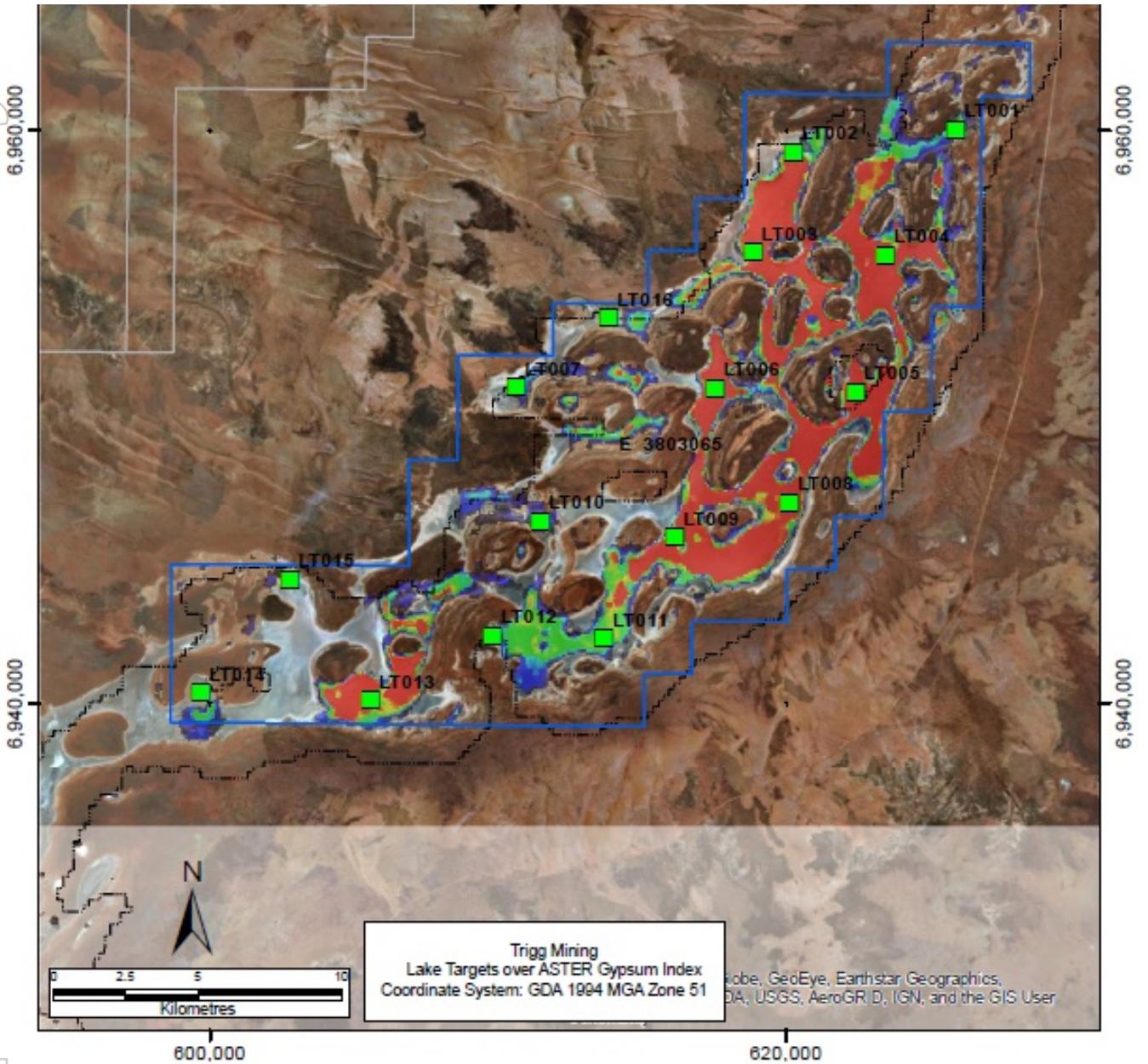
The information in this ASX Announcement that relates to Exploration Results at Lake Hope Campbell is based on, and fair represents, information compiled by Mr Adam Lloyd, who is a member of the Australian Institute of Geoscientists and International Association of Hydrogeologists. Mr Lloyd has verified and approved the data disclosed in the release, including the sampling, analytical and test data underlying the information.

Mr Lloyd is employed by Advisian, an independent consulting company. Mr Lloyd has sufficient experience, which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the 2012 Edition of the JORC "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves". Mr Lloyd consents to the inclusion in this ASX Announcement of the matters based on the information in the form and context in which it appears.



**Figure 1:** Showing sampling activities over Lake Throssell (LHS) and an example of gypsum crystals identified in the field (RHS)

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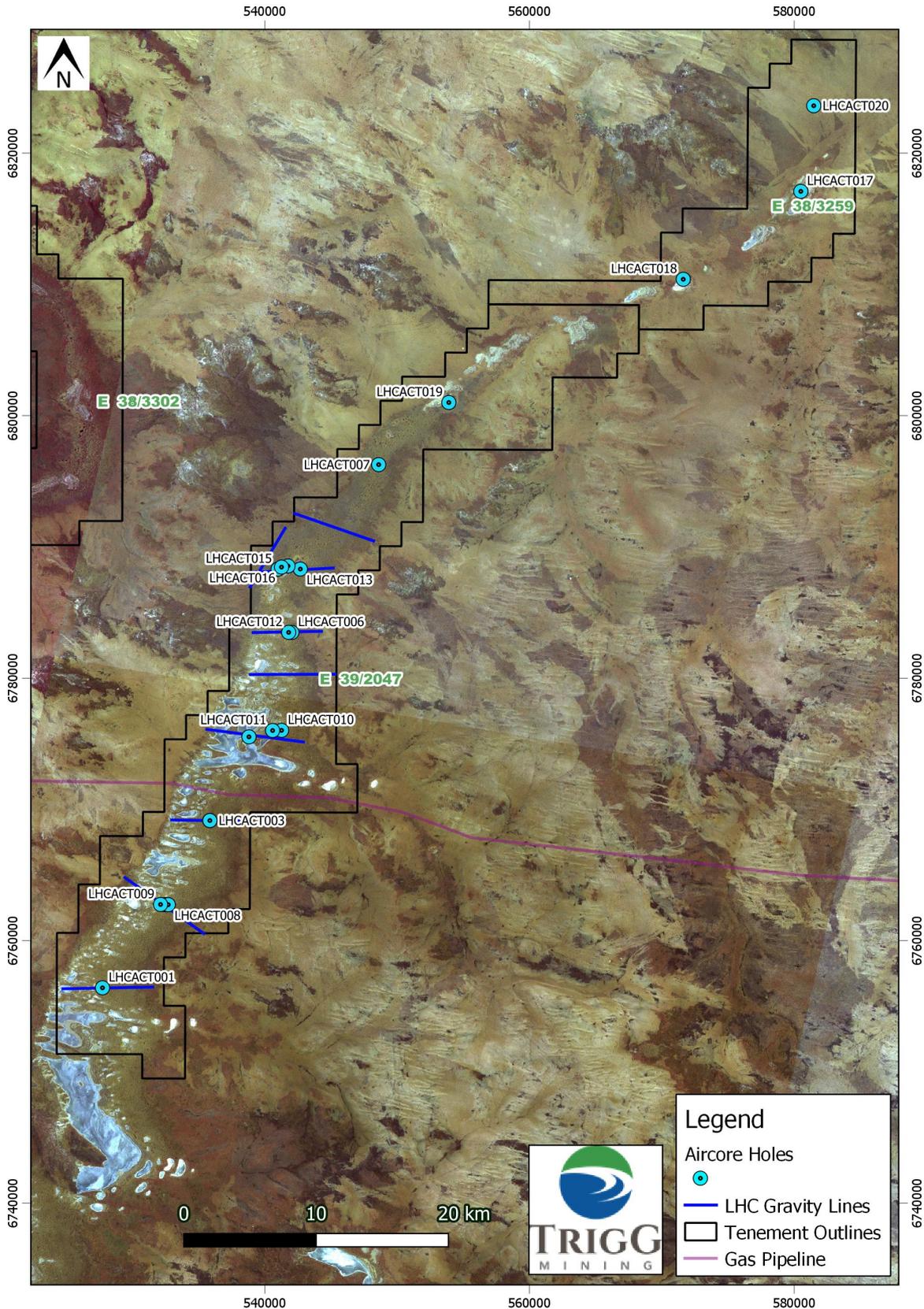
**Figure 2:** Sample Locations – with Aster Satellite gypsum index anomalies overlain





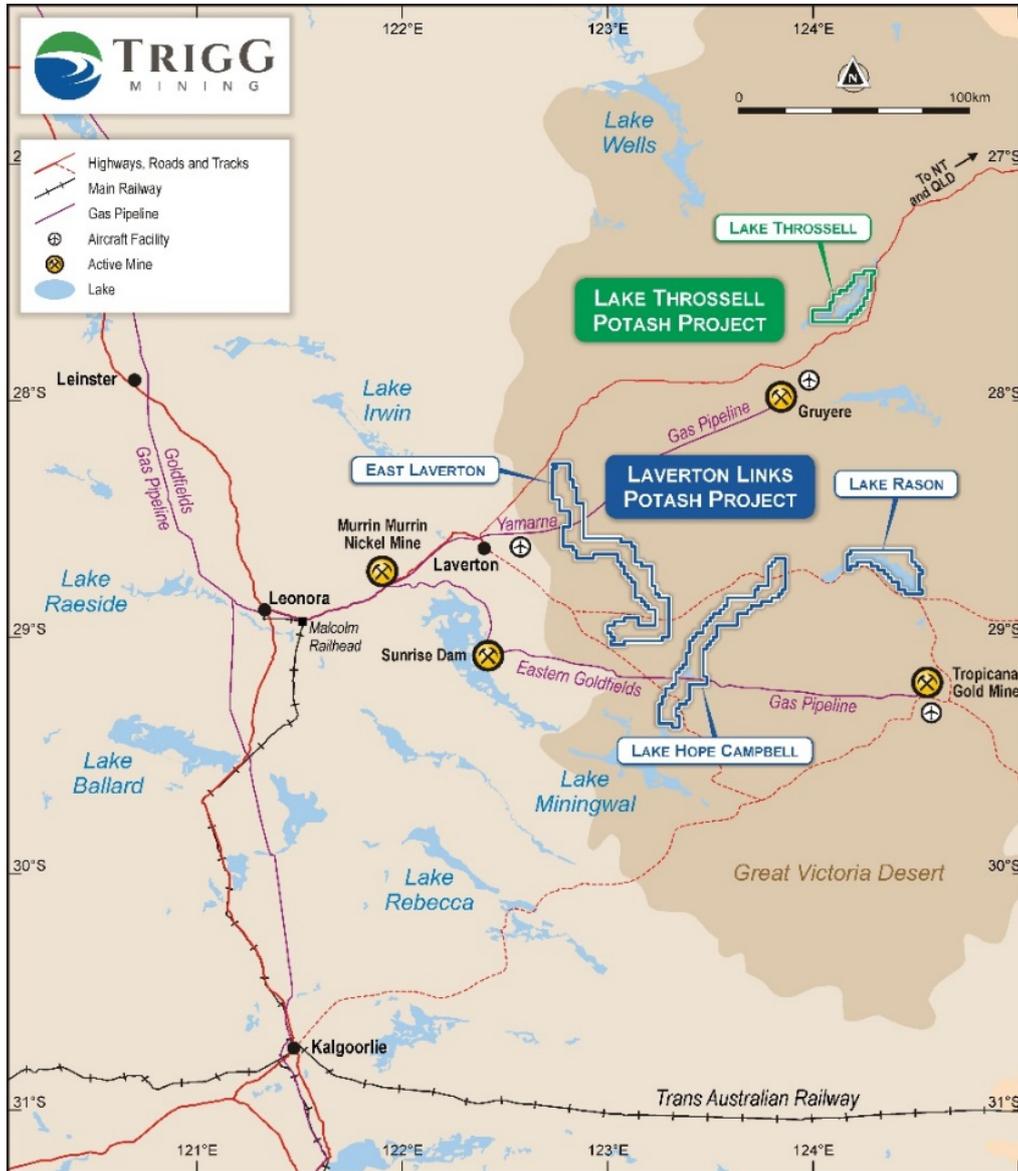
**Figure 4:** Palaeochannel sand and gravel encountered at LHCACT008

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**Figure 5:** Lake Hope Campbell gravity lines and drill hole locations

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**Figure 6:** Location of Trigg Mining’s SOP Projects showing established infrastructure and Prospect Locations

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**Table 1: Lake Throssell Auger Locations (MGA51Z51)**

Site ID	Easting	Northing	RL (m)	Water level (cm below surface)	Hole depth (cm)
LT001	625864	6959997	364	70	120
LT002	620233	6959250	365	30	110
LT003	618832	6955734	366	50	120
LT004	623424	6955635	363	33	120
LT005	622383	6950849	364	32	110
LT006	617496	6950979	365	39	120
LT007	610629	6951011	363	36	110
LT008	620071	6946977	369	38	120
LT009	616099	6945768	368	39	120
LT010	611438	6946320	371	39	120
LT011	613656	6942220	365	38	120
LT012	609780	6942352	369	81	110
LT013	605549	6940072	371	51	120
LT014	599651	6940332	374	50	100
LT015	602745	6944274	370	95	110
LT016	613817	6953422	364	42	80

**Table 2: Aircore drill holes (MGA51Z51)**

Hole Number	Easting	Northing	Dip	Azimuth	Hole Depth (m)
LHCACT001	527725	6756408	90	0	40
LHCACT002	532406	6762752	90	0	108
LHCACT003	535839	6769154	90	0	57
LHCACT004	535842	6769155	90	0	93
LHCACT005	538796	6775534	90	0	76
LHCACT006	542038	6783489	90	0	84
LHCACT007	548600	6796276	90	0	74
LHCACT008	532695	6762744	90	0	101
LHCACT009	532113	6762759	90	0	69
LHCACT010	541262	6776029	90	0	114
LHCACT011	540584	6776017	90	0	113
LHCACT012	541797	6783494	90	0	105
LHCACT013	542680	6788320	90	0	14
LHCACT014	541746	6788550	90	0	21
LHCACT015	540996	6788313	90	0	68
LHCACT016	541257	6788468	90	0	38
LHCACT017	580506	6817100	90	0	69
LHCACT018	571620	6810399	90	0	74
LHCACT019	553901	6801011	90	0	74
LHCACT020	581483	6823624	90	0	71

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**Table 3: JORC Tables**

Section 1 - Sampling techniques and Data		
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.</li> <li>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>No sample results have been presented</li> </ul>
<b>Drilling techniques</b>	<ul style="list-style-type: none"> <li>Drill type (e.g. core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (e.g. 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>Lake Hope Campbell aircore drilling was at 3.5" diameter.</li> <li>Lake Throssell auger holes were hand augered with 8" solid flight augers</li> <li>All holes were drilled vertically.</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>Lithological sample recovery was very good from aircore drilling, indicated by large piles of lithological sample.</li> </ul>
<b>Geologic 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 geological samples collected during all forms of drilling are qualitatively logged at 1 m intervals, to gain an understanding of the variability in aquifer materials hosting the brine.</li> <li>Geological logging and other hydrogeological parameter data is recorded within a database.</li> <li>Drilling lithological samples are washed and stored in chip trays for future reference.</li> </ul>
<b>Subsampling techniques and sample preparation</b>	<ul style="list-style-type: none"> <li>If core, whether cut or sawn and whether quarter, half or all core taken.</li> <li>If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.</li> <li>For all sample types, the nature, quality and appropriateness of the sample preparation technique.</li> <li>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</li> </ul>	<ul style="list-style-type: none"> <li>No sample results are reported</li> </ul>

**Section 1 - Sampling techniques and Data**

Criteria	JORC Code explanation	Commentary
	<ul style="list-style-type: none"> <li>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.</li> <li>Whether sample sizes are appropriate to the grain size of the material being sampled.</li> </ul>	
<b>Quality of assay data and laboratory tests</b>	<ul style="list-style-type: none"> <li>The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.</li> <li>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.</li> <li>Nature of quality control procedures adopted (e.g. standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (i.e. lack of bias) and precision have been established.</li> </ul>	<ul style="list-style-type: none"> <li>No sample results are reported</li> </ul>
<b>Verification of sampling and assaying</b>	<ul style="list-style-type: none"> <li>The verification of significant intersections by either independent or alternative company personnel.</li> <li>The use of twinned holes.</li> <li>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</li> <li>Discuss any adjustment to assay data.</li> </ul>	<ul style="list-style-type: none"> <li>No sample results are presented</li> </ul>
<b>Location of data points</b>	<ul style="list-style-type: none"> <li>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.</li> <li>Specification of the grid system used.</li> <li>Quality and adequacy of topographic control.</li> </ul>	<ul style="list-style-type: none"> <li>Hole location coordinates obtained by handheld GPS.</li> <li>The grid system used was MGA94, Zone 51.</li> </ul>
<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>At Lake Hope Campbel Drilling has resulted in drill hole spacing of approximately 300 m along drill transects and 7 km in the south and 10 km in the north.</li> <li>Data spacing at Lake Throssell is shown in Figure 1 and is approximately at a 3 to 5km spacing.</li> <li>No geological modelling, Mineral Resources or Ore Reserves have been estimated.</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>Not applicable, considering the deposit type.</li> <li>All drill holes are vertical</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>No samples have been reported</li> </ul>
<b>Audits or reviews</b>	The results of any audits or reviews of sampling techniques and data.	<ul style="list-style-type: none"> <li>none</li> </ul>

## Section 2 – Reporting of 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 licence to operate in the area.</li> </ul>	<ul style="list-style-type: none"> <li></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>Areva completed two drilling transects at the north of Lake Hope Campbell. The results of this drilling was used to plan drill holes at the very north of Lake Hope Campbell</li> <li>AEM surveys completed by Geoscience Australia over Lake Hope Campbell tenements was used to plan gravity surveys and some drilling targets. In many cases the high conductance of the palaeovalley sediments and brine meant that the signal penetration was limited to &lt;50 m depth.</li> </ul>
<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>The deposit is a brine containing potassium and sulphate ions that could form a potassium sulphate salt. The brine is contained within saturated sediments.</li> <li>Brine hosted drilling targets include the lake surfaces and palaeochannel sand aquifers.</li> </ul>
<b>Drill hole Information</b>	<p>A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drillholes:</p> <ul style="list-style-type: none"> <li>easting and northing of the drillhole collar</li> <li>elevation or RL (Reduced Level – elevation above sea level in metres) of the drillhole collar</li> <li>dip and azimuth of the hole</li> <li>downhole length and interception depth</li> <li>hole length.</li> </ul> <p>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.</p>	<ul style="list-style-type: none"> <li>Information has been included in drill collar tables.</li> <li>All holes are vertical.</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 (eg 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>Not applicable due to exploration results being applicable to a brine and not a solid.</li> <li>No low or high grade cut-off grade has been implemented.</li> </ul>

Criteria	JORC Code explanation	Commentary
<b>Relationship between mineralisation widths and intercept lengths</b>	<ul style="list-style-type: none"> <li>• <i>These relationships are particularly important in the reporting of Exploration Results.</i></li> <li>• <i>If the geometry of the mineralisation with respect to the drillhole angle is known, its nature should be reported.</i></li> <li>• <i>If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (e.g. 'downhole length, true width not known').</i></li> </ul>	<ul style="list-style-type: none"> <li>• Not applicable due to exploration results being applicable to a brine and not a solid.</li> </ul>
<b>Diagrams</b>	<ul style="list-style-type: none"> <li>• <i>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.</i></li> </ul>	<ul style="list-style-type: none"> <li>• Refer to figures/tables in this announcement.</li> </ul>
<b>Balanced reporting</b>	<ul style="list-style-type: none"> <li>• <i>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.</i></li> </ul>	<ul style="list-style-type: none"> <li>• All pertinent results have been reported.</li> <li>• Brine and lithological sample analysis is due to be completed in Q3 FY20</li> <li>• Reporting is limited to drill hole data.</li> </ul>
<b>Other substantive exploration data</b>	<ul style="list-style-type: none"> <li>• <i>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.</i></li> </ul>	<ul style="list-style-type: none"> <li>• Gravity geophysical surveys have been completed across the southern section of Lake Hope Campbell where the AEM survey does not penetrate the depth of palaeochannel. These surveys have helped define the margins of the palaeochannel and map its footprint between drilled locations.</li> <li>• In addition to brine grade, qualitative information on brine flows from airlift data is an important indicator of the prospectivity of a brine deposit. "Strong brine flows" are indicative of flow rates that are only constrained by the drilling method not the formation.</li> </ul>
<b>Further work</b>	<ul style="list-style-type: none"> <li>• <i>The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling).</i></li> <li>• <i>Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.</i></li> </ul>	<ul style="list-style-type: none"> <li>• Geological and Resource modelling to potentially establish maiden Mineral Resources.</li> <li>• Additional groundbased geophysical surveys to generate more drilling targets and map the palaeovalley sediments.</li> <li>• Drilling of test production bores, aquifer testing and geophysical logging to determine aquifer properties of the identified geological units,</li> <li>• Additional exploration drilling to close the drill spacing.</li> <li>• On lake trenching and test pumping.</li> </ul>