



**ARDIDEN**

11 December 2017

## **FURTHER THICK SPODUMENE-BEARING PEGMATITES INTERSECTED AT NORTH AUBRY CONFIRM POTENTIAL TO EXPAND SEYMOUR LAKE LITHIUM PROJECT**

*Latest drilling continues to extend North Aubry lithium deposit down-plunge to the north*

### **HIGHLIGHTS:**

- Multiple spodumene-bearing pegmatites intersected at various depths in the next eight diamond drill holes at the North Aubry prospect, part of Ardiden's 100%-owned Seymour Lake Lithium Project in Ontario, Canada.
- Thick mineralised zones containing large spodumene crystals were intersected with a down-hole width of up to 19.38m (SL-17-71), with the mineralisation remaining open in all directions.
- Drilling reaffirms the presence of multiple pegmatite zones extending north-eastwards with down-plunge continuity at the North Aubry Lithium Deposit – with the mineralisation remaining open to the north, east, west and down-dip.
- Drilling continues to provide a greater level of confidence in the continuity of the mineralisation, while also steadily increasing the overall scale of the project.
- Latest results support the Company's objective of exercising the Yantai Term Sheet and progressing its fast-track development strategy at Seymour Lake.

Diversified minerals explorer and developer Ardiden Limited (ASX: ADV) is pleased to advise that ongoing resource expansion diamond drilling program at the North Aubry prospect, part of its 100%-owned **Seymour Lake Lithium Project** in Ontario, Canada continues to demonstrate the potential to expand the deposit down-plunge to the north.

The next eight drill holes have all intersected multiple spodumene-bearing pegmatites at various depths at North Aubry, including significant thick zones of mineralisation of up to **19.38m** down-hole. This confirms the down-plunge continuity potential of the lithium mineralisation extending north-east from the North Aubry deposit, where Ardiden recently defined a Phase 1 Mineral Resource estimate.

Assays for the holes are awaited and planning is already underway to undertake further exploration drilling across all the Aubry prospects.

The continued drilling success at North Aubry clearly demonstrates the potential to expand the Mineral Resource at Seymour Lake, providing strong support for the Company's fast-track development strategy, including its immediate objective of exercising the Term Sheet with its Chinese development partner, Yantai.

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## NORTH AUBRY PROSPECT DRILLING

The additional eight diamond drill-holes completed at North Aubry (holes SL-17-66, SL-17-70 to SL-17-72 and SL-17-74 to SL-17-77) successfully intersected multiple spodumene-bearing pegmatites, with all of the holes now completed and logged by the Company's geological team.

Visual logging of the core has confirmed the presence of multiple pegmatite layers at various depths, including (refer to Table 2 for a full list):

- Hole SL-17-71, which intersected **19.38m** continuous metres of spodumene-bearing sills from 136.2m down-hole over a total down-hole thickness of approximately 165m;
- Hole SL-17-75, which intersected a **15.45m** spodumene-bearing sills from 71.30m down-hole over a total down-hole thickness of approximately 108m; and
- Hole SL-17-66, which intersected a continuous **13.20m** zone of spodumene-bearing sills from 121.20m down-hole over a total down-hole thickness of approximately 141m.



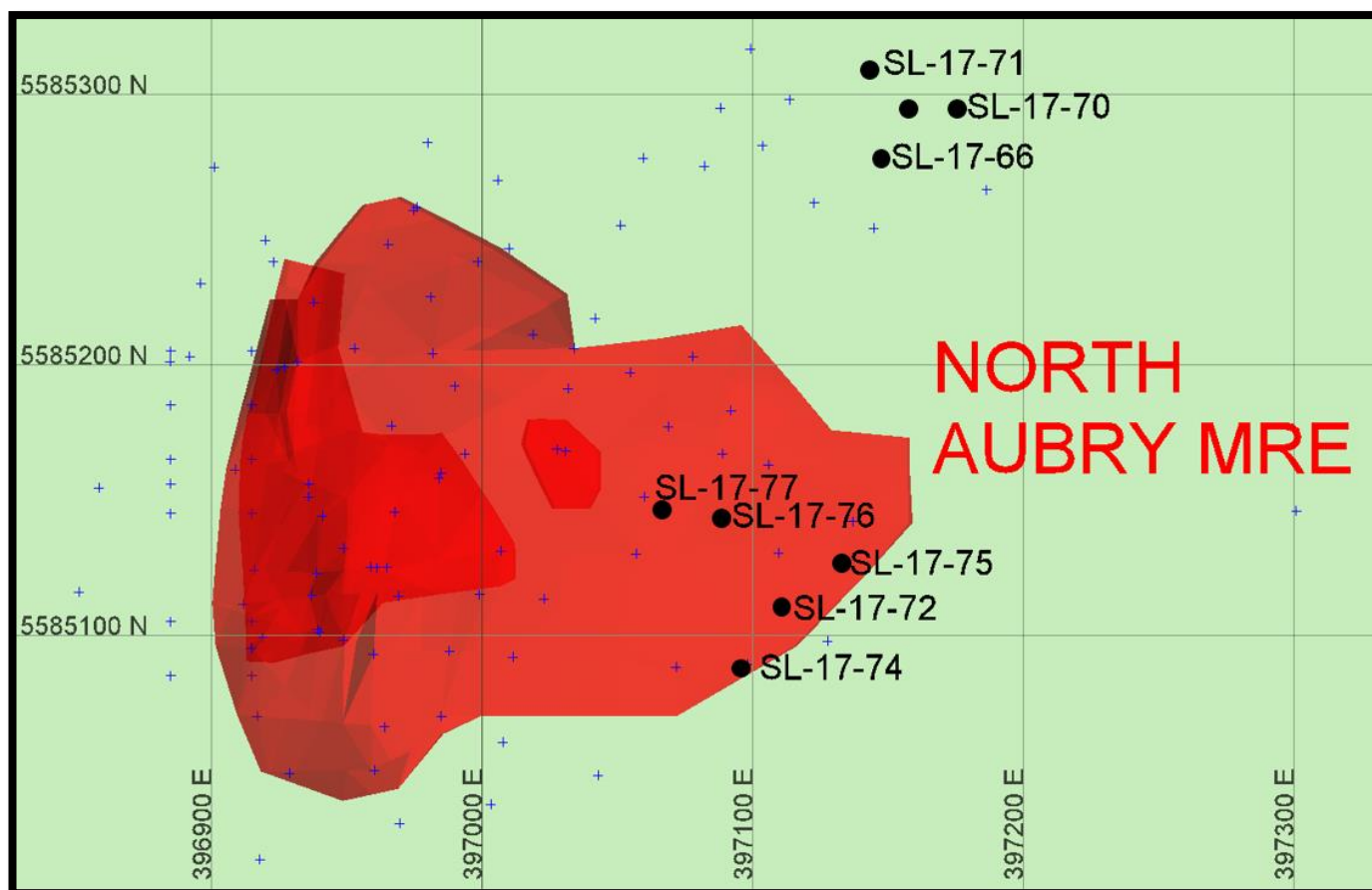
**Figure 1.** Drill core obtained from drill hole SL-17-75 (from 76.4.8m to 89.0m) showing the intersection of high-quality spodumene-bearing pegmatite (the lighter coloured material in the photo is the Pegmatite, whilst the darker material is Mafic Volcanic).

The drilling has again verified the presence of multiple spodumene bearing pegmatite sills of various thicknesses, with the visual intersections confirming the potential to expand the mineralised zones at North Aubry to the north-east.

The identification within the drill core of very large white spodumene crystals is another good indicator of the high quality spodumene present at this location.

Ardiden confirms the drill core has been logged, cut and prepared and is currently being analysed at Activation Laboratories in Thunder Bay.

The true potential of this location has not been fully drill tested and the mineralisation remains open in all directions and at depth. The Company is targeting known lithium mineralisation hosted in multiple sills, and will continue to develop its geological interpretation of the North Aubry deposit as further assay results are received.



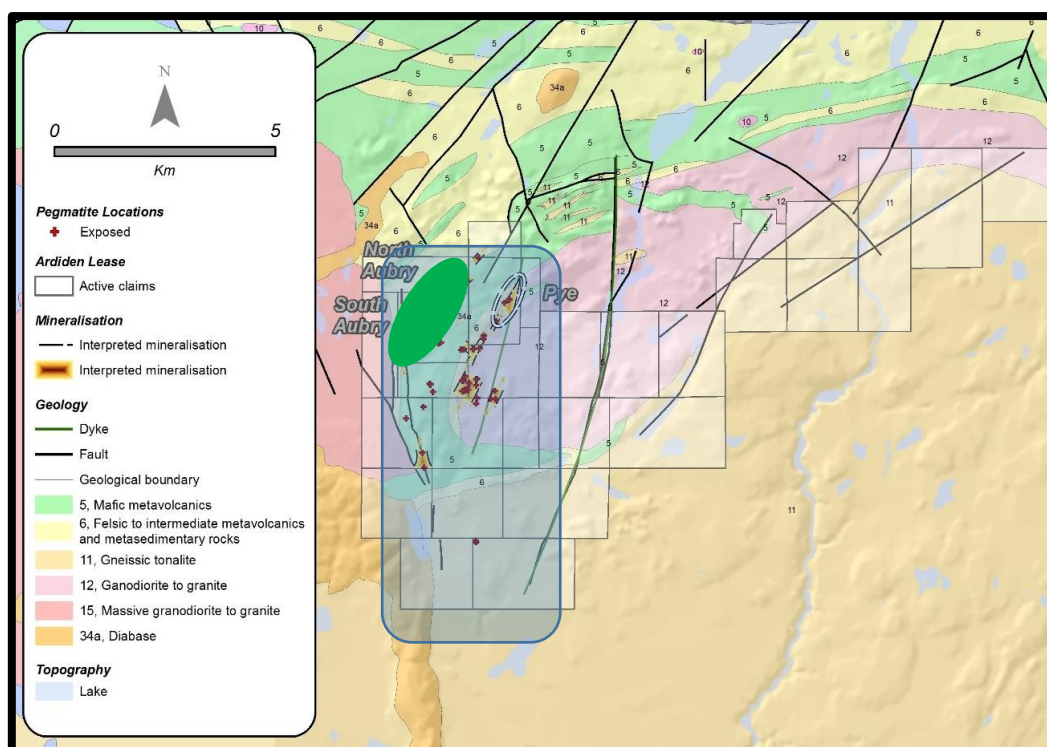
**Figure 2.** Plan showing the reported drill hole locations (black) and the historical collars (blue) at the North Aubry prospect

The results further highlight the strong potential to expand the Seymour Lake Project, with the red crosses on the image (Figure 3) below identifying numerous pegmatite exposures that have not yet been fully explored or tested.

The area highlighted in green contains the North Aubry lithium deposit and the Central and South Aubry prospects, which contain the previously announced Exploration Target of 3-5Mt at 1.2 – 1.6% Li<sub>2</sub>O (announced on 4 October 2017). The remaining 5km strike zone highlighted in blue remains open and untested.

Only about 5% of the regional pegmatites have been drilled, and the broader potential of the project is yet to be fully evaluated. The North Aubry prospect is just one of approximately 40 pegmatite exposures that were identified along the 5km strike zone during that exploration program, with several of these exposures hosting visible spodumene (refer to Figure 3).

Based on the latest results from North and South Aubry, Ardiden is finalising plans for the next round of resource expansion diamond drilling at Seymour Lake.



**Figure 3.** Overview map of the Seymour Lake project claims, identifying the multiple pegmatite exposures along the 5km strike zone (Aubry prospects highlighted in green).

## EXPLORATION UPSIDE

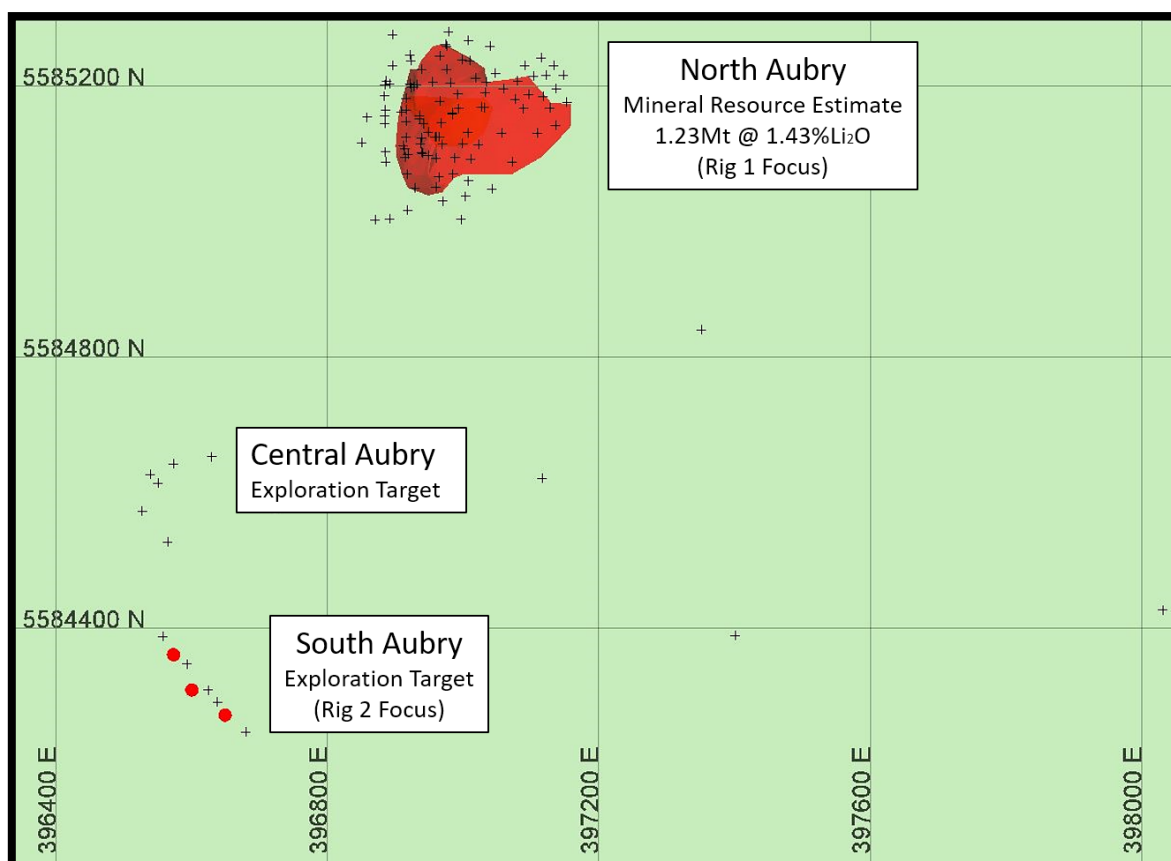
Last month Ardiden announced the South Aubry drilling results (13 November 2017), which confirmed the pegmatites as being either at or close to surface and extend to depth. The physical similarities identified in the pegmatites at each of the different prospects indicates that the pegmatite swarm maybe connected across all three Aubry prospect areas, which covers an initial strike length of approximately 1,100m.

Ardiden notes that the initial JORC Resource estimate of 1.23Mt at 1.43% Li<sub>2</sub>O (announced on 4 October 2017) at North Aubry is only contained within the first 300m of this Aubry strike (Figure 4).

**Table 1.** North Aubry, October 2017 Mineral Resource Estimate Table. (Note that some of the numbers may not equate fully due to the effects of rounding.)

Resource Category	Tonnes (Mt)	Grade Li <sub>2</sub> O%	Contained Tonnes of Lithium (000's)
Indicated	0.44	1.52	3.1
Inferred	0.79	1.38	5.1
<b>TOTAL</b>	<b>1.23</b>	<b>1.43</b>	<b>8.2</b>

The identification of pegmatites either at, or close to surface represents a strategic advantage for the project, potentially allowing easier access to high-quality mineralisation in a future mining scenario. The proximity of the pegmatites to surface is likely to reduce the required pre-strip.



**Figure 4.** Plan View of Seymour Lake Exploration Target with North Aubry Mineral Resource Estimate

Ardiden confirms the estimated combined initial Exploration Target range for the Central and South Aubry deposits of approximately **3Mt to 5Mt at 1.2% Li<sub>2</sub>O to 1.6% Li<sub>2</sub>O**, as well as extensions to North Aubry (announced 4 October 2017). The potential quantity and grade is conceptual in nature, and there has been insufficient exploration to estimate a Mineral Resource.

The Exploration Target has been reported in accordance with the JORC Code, 2012 Edition on a qualitative basis taking into consideration numerous factors including regional and local context, data support, surface mapping and sampling and historical data. All factors that have been considered are outlined in the Company's ASX Announcement dated 4 October 2017. The Exploration Target is conceptual in nature and should not be construed as a Mineral Resource that may or may not be defined as a result of further drilling and sampling.

**Competent Person's Statement:**

*The information in this report that relates to Data and Exploration Target at the North, Central and South Aubry on Seymour Lake Lithium project is based on, and fairly represents, information and supporting documentation prepared by Ms Karen Lloyd, who is a Fellow of the Australasian Institute of Mining & Metallurgy. Ms Lloyd is not a full-time employee of the Company Ms Lloyd is employed as a Consultant from Jorvik Resources Pty Ltd. Ms 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 'Australasian Code for Reporting of Mineral Resources and Ore Reserves (the JORC Code)'. Ms Lloyd consents to the inclusion in this report the exploration results and the supporting information in the form and context as it appears.*

Ardiden confirms further drilling and exploration is required in order to obtain a true understanding of the size and scale and overall structure of the pegmatite swarms of all the pegmatite sills contained at the North, Central and South Aubry prospects.

Ardiden notes that although the pegmatites at Seymour Lake can be somewhat difficult to model and predict due to the variable fluid pathways, confirmation of the interpreted extensions of the spodumene-bearing pegmatites and the verification of multiple pegmatite sills in the latest drilling provides the Company with a greater level of understanding and confidence in the project, while also steadily expanding the overall scale of the project and its future resource potential.



Ardiden confirms that the drill logs contained in this announcement refer to the identification and distribution of visible spodumene crystals of various sizes and colours contained within drill core samples. Ardiden notes that the estimated distribution of visible spodumene crystals in the drill core is not an accurate reflection of potential lithium grade and this will be determined with additional laboratory analysis.

The Company also notes that it has reported various widths of the highly evolved spodumene-bearing pegmatites. The North Aubry pegmatites are classified as highly evolved, complex type, spodumene-subtype, lithium-caesium-tantalum pegmatites. These pegmatites generally form under high-pressure–low-temperature conditions, display complex internal zoning, have relatively low Nb/Ta ratios in the ore-forming assemblages, and contain significantly elevated tantalum values.

Ardiden confirms that the North Aubry prospect contains multiple layers of highly evolved complex pegmatites and, as such, a number of the diamond drill-holes have been reported with a down-hole aggregate of visible spodumene-bearing and non-spodumene-bearing pegmatites.

The highly evolved non-spodumene-bearing pegmatites have been clearly identified in the drill log, however the lack of spodumene crystals being externally visible in the drill core is not an accurate reflection of the potential spodumene crystal content within the drill core or the potential lithium grade of the sample, which will be determined with additional laboratory analysis.

Ardiden looks forward to providing further updates as they come to hand.

**Table 2.** Results for drill holes SL-17-66, SL-17-70 - SL-17-72 and SL-17-74 - SL-17-77 at Seymour Lake Lithium Project.

Hole ID	East	North	End of Hole (m)	Azimuth	Dip	From (m)	To (m)	Interval (m)	Description
SL-17-66	397149	5585276	141	200	-60	0.00	2.00	2.00	Overburden
SL-17-66	397149	5585276	141	200	-60	2.00	121.20	119.20	Mafic volcanic; massive basalt flow. Fgr to near mgr, homogenous, competent and rel pristine. 1-4% planar and irregular calc/carb/qtz veining. Gen wkly fractured locally with carb +/- chl infill
SL-17-66	397149	5585276	141	200	-60	<b>121.20</b>	<b>134.40</b>	<b>13.20</b>	<b>Spodumene Nb/Ta Pegmatite:</b> Massive Pegmatite, Spodumene-bearing pegmatite with quartz and albite (cleavelandite); local muscovite



									with patches of quartz-albite
SL-17-66	397149	5585276	141	200	-60	134.40	141.00	6.60	Mafic volcanic; as described above.
							<b>TOTAL</b>	<b>13.20</b>	
SL-17-70	397176	5585294	156	200	-60	0.00	2.65	2.65	Overburden
SL-17-70	397176	5585294	156	200	-60	2.65	52.10	49.45	Mafic volcanic; Fgr & Mgr basalt flow. Typically pillowed, Also local calc 'spotting' and staining or incipient alt'n. Gen wkly fractured, common carb infill + local chl.
SL-17-70	397176	5585294	156	200	-60	<b>52.10</b>	<b>52.60</b>	<b>0.40</b>	<b>Nb/Ta Pegmatite:</b> Massive Pegmatite; Sodic phase. Fgr sugary alb often intimate with fgr gry qtz. Massive, 3-4% mgr grn Musc. Rare traces of vfgr blk Nb/Ta oxides
SL-17-70	397176	5585294	156	200	-60	52.60	138.75	86.15	Mafic volcanic; Fgr basalt flow. Pillowed with 3-% calc + qtz veining - planar or irregular. Also local calc 'spotting' and staining or weak incipient alt'n. Gen wkly fractured, common carb infill + local chl
SL-17-70	397176	5585294	156	200	-60	<b>138.75</b>	<b>149.55</b>	<b>10.80</b>	<b>Spodumene Nb/Ta Pegmatite:</b> Massive Pegmatite; Potassic phase with fgr sugary alb or radiating cleavandite (sodic zones), intimate with fgr gry qtz at contact margins. Massive, perthic wh Kspar



									megacrysts alternate with mosaic like gry qtz/ grn Musc and Spodumene. Spodumene averages 5.5% but locally reaches 25% over 1m. Minor Spod with sodic zones is commonly oxid'd and altered. Traces of vfgr blk Nb/Ta oxides
SL-17-70	397176	5585294	156	200	-60	149.55	156.00	6.45	Mafic volcanic; Fgr -near mgr basalt flow. 1-3% somewhat irregular calc + qtz veining. Also local calc 'spotting' and staining or weak incipient alt'n. Minor Epid. Gen wkly fractured, common carb infill + local chl
							<b>TOTAL</b>	<b>10.80</b>	
SL-17-71	397142	5585309	165	200	-60	0.00	1.85	1.85	Overburden
SL-17-71	397142	5585309	165	200	-60	1.85	49.33	47.48	Mafic volcanic; Fgr massive pillowed basalt. Becomes mgr near 45.5m. Locally faintly foliated. Foliation varies but dominantly @ 35deg TCA. 2-4% rel regular or planar calc/qtz veining. Competent and weakly fractured with local sections of chl alt'n (after brittle deform'n)
SL-17-71	397142	5585309	165	200	-60	<b>49.33</b>	<b>49.44</b>	<b>0.11</b>	<b>Pegmatite dykelet:</b> . Dykelets are sodic or albitic phases with fgr sugary alb often intimate with vfgr gry qtz and





									<5% fgr-mgr grn Musc
SL-17-71	397142	5585309	165	200	-60	49.44	57.32	7.88	Mafic volcanic; as described above.
SL-17-71	397142	5585309	165	200	-60	<b>57.32</b>	<b>57.67</b>	<b>0.35</b>	<b>Pegmatite dykelet:</b> as described above
SL-17-71	397142	5585309	165	200	-60	57.67	58.85	1.18	Mafic volcanic; as described above.
SL-17-71	397142	5585309	165	200	-60	<b>58.85</b>	<b>58.95</b>	<b>0.10</b>	<b>Pegmatite dykelet:</b> as described above
SL-17-71	397142	5585309	165	200	-60	58.95	136.22	77.27	Mafic volcanic; as described above.
SL-17-71	397142	5585309	165	200	-60	<b>136.22</b>	<b>155.60</b>	<b>19.38</b>	<b>Spodumene Nb/Ta Pegmatite:</b> Massive Pegmatite; Potassic zone with vcgr or megacrysts of Perthitic wh Kspar forming meter scale sections or alternating with coarse dk mosaic of grn Musc, gry qtz and lt grn to near white, sporadic Spodumene. Lt grn to near white Spodumene ave's 5.5% -locally reaching at least 15%. Musc books up to 5cm. First 20cm and last 60cm near contacts are sodic zones with vfgr sugary alb intimate with gry qtz, minor musc and hosting traces of vfgr blk Nb/ta oxides and bluish Flour-apatite
SL-17-71	397142	5585309	165	200	-60	155.60	161.07	5.47	Mafic volcanic; Fgr-mgr massive basalt. Dark and amph rich. Gen str fracturing -locally shattered with carb +/- chl infill.
SL-17-71	397142	5585309	165	200	-60	<b>161.07</b>	<b>161.89</b>	<b>0.82</b>	<b>Spodumene Nb/Ta Pegmatite:</b> Massive Pegmatite; Sodic zone with vfgr sugary alb which is intimate



									with vfgr gry qtz. ~5% mostly fgr-mgr grn Musc but locally as books up to 5cm. Traces of vfgr blk Nb/Ta oxides and rare trace blue Fl-apatite. Approx 1% Spodumene but Spod is typically altered and oxidized -leached of Lithium.
SL-17-71	397142	5585309	165	200	-60	161.89	165.00	3.11	Mafic volcanic; Fgr-mgr massive basalt. Dark and amph rich. Gen weak fracturing 1-3% somewhat regular calc/qtz veining. Competent and pristine
							<b>TOTAL</b>	<b>20.20</b>	
SL-17-72	397102	5585109	120	270	-60	0.00	0.85	0.85	Overburden
SL-17-72	397102	5585109	120	270	-60	0.85	68.54	67.69	Mafic volcanic; Fgr mostly massive basalt flow. Locally pillowed. 5-8% calc/epid/qtz irregular veining + pactly fracture introduced epid/calc staining/flooding - alt'n. Local diss Py from 35-38m with vein'g. Material becomes massive, rel homog and with 1-3% veining after 38m.
SL-17-72	397102	5585109	120	270	-60	<b>68.54</b>	<b>75.20</b>	<b>6.66</b>	<b>Spodumene Nb/Ta Pegmatite:</b> Massive pegmatite; Potassic zone with vcgr or megacrysts of Perthitic wh Kspar forming



									meter scale sections or alternating with coarse dk mosaic of grn Musc, gry qtz and lt grn vfg tp mg sporadic Spodumene. Lt grn Spodumene ave's 4%. Sodic zones prominent along contacts with vfgr sugary alb intimate with gry qtz, minor musc and hosting traces of vfgr (to locally mgr) blk Nb/ta oxides and bluish Flouro-apatite.
SL-17-72	397102	5585109	120	270	-60	75.20	120.00	44.80	Mafic volcanic; Fgr mostly massive basalt flow. Locally pillowed with up to 20-25% calc/epid +/- qtz irregular veining + pachy fracture introduced epid/calc -alt'n. Diss FC py occurs with veining.
							<b>TOTAL</b>	<b>6.66</b>	
SL-17-74	397080	5585116	102	270	-60	0.00	2.65	<b>2.65</b>	Overburden
SL-17-74	397080	5585116	102	270	-60	2.65	59.40	56.75	Mafic volcanic; Pillowed basalt flow. Mostly fgr (very locally mgr) and typically pillowed with amph rich +/- epid selvages. Local foliation varies from 25 to 45deg TCA. Mod-str epid and 1% diss Py from 53.5 to 59.4m Wk to mod fracturing, gen competent. 2-3% calc + qtz veining.



									Local traces of mm subhedral pk garnet.
SL-17-74	397080	5585116	102	270	-60	59.40	68.30	8.90	<b>Spodumene Nb/Ta Pegmatite:</b> Massive Pegmatite; Potassic (Kspar rich) phase with typical fgr alb sodic zones at contacts for 75 and 30cm respectively. Coarse perthitic Kspar with wk F.C. oxid'n as dominant mineral which alternates or has coarse inclusions of grn Musc, gry qtz and lt grn Spodumene. Kspar is locally graphic with 'blebs' of gry qtz. Spodumene ave's approx 2% locally reaching 7% over 1m. Spod is locally oxidized/alt'd. Traces of bl-grn Fl-apatite and vfgr blk Nb/Ta oxides concentrated in Sodic zones but not exclusively.
SL-17-74	397080	5585116	102	270	-60	68.30	102.00	33.70	Mafic volcanic; Pillowed basalt flow. Mostly fgr (becoming mgr and homogenous after 97.1m). Local foliation varies from 0 to 30deg TCA. Pillow selvages are of hble/calc/epid +/- qtz. Patchy and spotted F.C. carb/epid alt'n to 97.1m. Gen competent and wkly fract'd except 81 to 86.4m which



									displays local badly broken core due to chl/carb fract's undulating down core axis. Traces of Diss Py.
							<b>TOTAL</b>	<b>8.90</b>	
SL-17-75	397123	5585101	108	270	-60	0.00	2.00	2.00	Overburden
SL-17-75	397123	5585101	108	270	-60	2.00	71.30	69.30	Mafic volcanic; Fgr to locally mgr pillowed basalt flow. Massive to wkly foliated dominantly @ 40deg TCA. Commonly heavily veined or flooded with calc +/- epid - up to 25% of core. Traces of fgr diss Py. Typically wkly fractured and rel competent.
SL-17-75	397123	5585101	108	270	-60	<b>71.30</b>	<b>86.75</b>	<b>15.45</b>	<b>Spodumene Nb/Ta Pegmatite:</b> Massive Pegmatite; Potassic zone. Dominant Fsp is creamy wh perthitic Kspar as meter scale sections or isolated megacrysts - commonly graphic with 'blebs' of gry qtz. 80cm of fgr albitic -sodic zone hosting traces of vfgr blk Nb/Ta oxides and rare bluish Fl-apatite fgr sugary or wkly developed cleavlandite near lower contact. Lt grn Spodumene ave's approx 5% but locally reaches >15%.
SL-17-75	397123	5585101	108	270	-60	86.75	108.00	21.25	Mafic volcanic; mgr then fgr, locally



									pillowed basalt. Massive becoming foliated near 96m dominantly @ 25deg TCA. Local str epid staining-alt'n, becoming nearly pervasive. 1-3% calc/qtz/epid veining. Gen competent and wkly fractured. Trace Py.
							<b>TOTAL</b>	<b>15.45</b>	
SL-17-76	397131	5585122	81	270	-60	0.00	0.80	0.80	Overburden
SL-17-76	397131	5585122	81	270	-60	0.80	55.70	54.90	Mafic volcanic; Fgr (locally mgr) massive pillowed basalt flow. Mgr and homogenous to 20m after which basalt is flooded or patchy alt'd with epid/calc -fracture introduced becoming near pervasive. After 34m material is mostly fgr, locally pillowed and with 1-3% calc/qtz/epid veining. Gen wkly to locally mod fractured.
SL-17-76	397131	5585122	81	270	-60	<b>55.70</b>	<b>67.55</b>	<b>11.85</b>	<b>Spodumene Nb/Ta Pegmatite:</b> Massive Pegmatite; Potassic phase with vcgr wh Kspar forming a mosaic texture with gry qtz and grn Musc (books up to 4cm) and lt grn to near white Spodumene. Contains local 10cm zones of vfgr sugary alb intimate with gry qtz (sodic zones) that host common flecks of





									bl Fl-apatite. Spodumene ave's approx 9% but locally reaches 25% over 1m. Last meter is sodic phase near lower contact.
SL-17-76	397131	5585122	81	270	-60	67.55	81.00	13.45	Mafic volcanic; Fgr massive pillowed basalt flow with foliated meter scale sections. Foliation varies considerably dom @ 25deg TCA. 1-3% conformable calc/qtz/epid +/- fsp veining. Gen wkly fractured and competent.
							<b>TOTAL</b>	<b>11.85</b>	
SL-17-77	397088	5585138	75	200	-60	0.00	1.00	1.00	Overburden
SL-17-77	397088	5585138	75	200	-60	1.00	48.80	47.80	Mafic volcanic; Gen mgr and massive with local discreet wk fol'n dom @ 40deg TCA. Very localized pillow selvages. 1-2% calc/epid/qtz veining becoming 3-4% after 38m. Gen competent and wkly fractured. Trace FC diss Py.
SL-17-77	397088	5585138	75	200	-60	<b>48.80</b>	<b>56.80</b>	<b>8.00</b>	<b>Spodumene Nb/Ta Pegmatite:</b> Massive Pegmatite; Mostly Sodic zone with fgr sugary alb intimate with vfgr gry qtz. Very local wh perthitic Kspar near top of intersection. Mosaic like texture with very cgr gry anhedral qtz, 2-4% fgr-cgr grn Musc and lt grn to near



									white Spodumene - commonly with musc inclusions. Traces of vfgr bl Fl-apatite and vfgr blk Nb/Ta oxides throughout. Spodumene ave's approx 10% locally reaching 30%.
SL-17-77	397088	5585138	75	200	-60	56.80	63.46	6.66	Mafic volcanic; Gen mgr and massive or wkly foliated @ ~25deg TCA. Dark and amph (hble0 rich) with local quasi calc/epid flooding. Gen competent and wkly fractured.
SL-17-77	397088	5585138	75	200	-60	<b>63.46</b>	<b>68.30</b>	<b>4.84</b>	<b>Spodumene Nb/Ta Pegmatite:</b> Massive Pegmatite; Mostly Potassic with last 60cm being Sodic (fgr sugary alb intimate with qtz). Gen coarse megacrysts of creamy wh or pk perthitic Kspar - commonly with graphic textured gry qtz. Very mnior grn Musc. Spodumene ave's approx 3.5% locally reaching 10% over 1m. Spod is lt grn and locally oxidized and altered. Vfgr blk Nb/ta oxides and bluish Fl-apatite with affinity to sodic phase.
SL-17-77	397088	5585138	75	200	-60	68.30	75.00	6.70	Mafic volcanic; Mgr massive to very faintly foliated @ ~45deg TCA. Homogenous and dark -amph rich

									with fgr wh fsp. Competent and wkly fractured. 1- 2% qtz/epid/carb veining.
							<b>TOTAL</b>	<b>12.84</b>	

**ENDS**

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**About Ardiden Ltd**

Ardiden Limited (ASX: ADV) is an emerging international diversified exploration and development company possessing a mature multi-element asset portfolio, with a near term development pipeline, focused quality projects located in the established mining jurisdiction of Ontario, Canada.

The 100%-owned Seymour Lake Lithium Project comprises 7,019 Ha of mining claims and has over 4,000m of historic drilling. Mineralisation is hosted in extensive outcropping spodumene-bearing pegmatite structures with widths up to 26.13m and grades of up to 6.0% Li<sub>2</sub>O. These high-grade pegmatite structures have been defined over a 5km strike length.

The 100%-owned Wisa Lake Lithium project is located 80km east of Fort Frances, in Ontario, Canada and only 8km north of the Minnesota/US border. The property is connected to Highway 11 (Trans-Canada), which is located 65km north via an all-weather road that crosses the centre of the project. The Wisa Lake Lithium Project consists of five claims (1,200 hectares) and covers the historical drilling location of the North Zone. Ardiden is aiming to commence a limited drill program to drill test and verify the historical lithium results.

The Pickle Lake Gold Properties (under option to acquire 100%) are located within the prolific gold-producing Meen-Dempster Greenstone Belt of the Uchi Geological Sub-province of the Canadian Shield, in close proximity to several of the Company's existing projects and to the regional mining centre of Thunder Bay. The Properties consists of four separate gold properties offering both advanced development opportunities and early stage exploration. Over 25,000m of historical diamond drilling

completed across the Pickle Lake Gold Properties, confirming the potential for multiple extensive gold mineralised zones at both Dorothy-Dobie Lake and Kasagiminnis Lake, with gold mineralisation remaining open along strike and at depth.

The 100%-owned Root Lake Lithium Project is located in Ontario, Canada. The project comprises 1,013 Ha of mining claims and has over 10,000m of historic drilling. Mineralisation is hosted in extensive outcropping spodumene-bearing pegmatite structures with widths up to 19m and grades of up to 5.10% Li<sub>2</sub>O. In addition, tantalum grades of up to 380 ppm were intersected.

The 100%-owned Root Bay lithium project is strategically located approximately 5km to the east of the recently acquired Root Lake Lithium Project and consists of three claim areas, totalling 720 hectares. The project was staked by Ardiden as part of its regional exploration focus in and around the Root Bay spodumene-bearing pegmatite.

Initial observations of the exposed pegmatite are characterized by coarse white albite, grey quartz and pale grey-green spodumene crystals up to 10cm long.

The 100%-owned Manitouwadge Flake Graphite Project covers an area 5,300 Ha and has a 20km strike length of EM anomalies with graphite prospectivity. Previous preliminary metallurgical test work indicated that up to 80% of the graphite at Manitouwadge is high value jumbo or large flake graphite. Test work also indicated that simple, gravity and flotation beneficiation can produce graphite purity levels of up to 96.8% for jumbo flake and 96.8% for large flake. With the proven caustic bake process, ultra-high purity (>99.95%) graphite can be produced. The graphite can also be processed into high value expandable graphite, high quality graphene and graphene oxide.

The Bold Properties project (under option to acquire 100%) is located approximately 50km north-east of the town of Mine Centre in Ontario, Canada. The property is connected to Highway 11 (Trans-Canada), which is located 25km south via an all-weather road. The Bold Property Project consists of four claims (1,024 hectares) and covers a number of anomalous sulphide zones. In 1992, Hexagon Gold (Ontario) Ltd. completed a total of 17 drill holes in multiple locations on and around the Bold Property Project at various depths of up to 428m down-hole. The nine grab samples that were collected by Hexagon in 1992 returned encouraging grades of up to 0.33% cobalt, 5.54% copper and 0.73% nickel, confirming the significant exploration potential.

All projects located in an established mining province, with good access to infrastructure (road, rail, power, phone and port facilities) and local contractors and suppliers.

#### **Competent Person's Statement**

The information in this report that relates to Data and Exploration Target at the North, Central and South Aubry on Seymour Lake Lithium project is based on, and fairly represents, information and supporting documentation prepared by Ms Karen Lloyd, who is a Fellow of the Australasian Institute of Mining & Metallurgy. Ms Lloyd is not a full-time employee of the Company. Ms Lloyd is employed as a Consultant from Jorvik Resources Pty Ltd. Ms Lloyd has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which she is undertaking to qualify as a Competent Person as defined in the 2012 Edition of the 'Australasian Code for Reporting of Mineral Resources and Ore Reserves (the JORC Code)'. Ms Lloyd consents to the inclusion in this report the exploration results and the supporting information in the form and context as it appears.

#### **Forward Looking Statement**

This announcement may contain some references to forecasts, estimates, assumptions and other forward-looking statements. Although the company believes that its expectations, estimates and forecast outcomes are based on reasonable assumptions, it can give no assurance that they will be achieved. They may be affected by a variety of variables and changes in underlying assumptions that are subject to risk factors associated with the nature of the business, which could cause actual results to differ materially from those expressed herein. All references to dollars (\$) and cents in this presentation are to Australian currency, unless otherwise stated. Investors should make and rely upon their own enquires and assessments before deciding to acquire or deal in the Company's securities.

## Table 1: Seymour Lake Lithium Project (Claim Title 1245661)

### Section 1 Sampling Techniques and Data

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

Criteria	JORC Code explanation	Commentary
Sampling techniques	<ul style="list-style-type: none"> <li>Nature and quality of sampling (e.g. 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 (e.g. 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30g 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 (e.g. submarine nodules) may warrant disclosure of detailed information.</li> </ul>	<ul style="list-style-type: none"> <li>Diamond Drill Core was cut in half using a core saw along the core axis.</li> <li>Bagging of the half core samples was supervised by a geologist to ensure there are no numbering mix-ups.</li> <li>One tag from a triple tag book was inserted in the core tray in the position of the sample interval.</li> <li>Standard sample intervals averaged 1 m.</li> <li>Sampling continued through intervening barren rock (if less than 10m width) where multiple Spodumene Pegmatite zones were intersected</li> <li>The sample preparation and assaying techniques are industry standard and appropriate for this type of mineralisation.</li> </ul>
Drilling techniques	<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>Diamond wireline core drilling.</li> <li>The drill core size is CHD 76, core diameter is 43.5 millimetres</li> <li>Drill holes were orientated using the Reflex ACT II RD core orientation tool</li> </ul>
Drill sample recovery	<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>The sample interval of core was measured and recorded along with a description and incorporated in the completed drill logs.</li> <li>Core within the mineralised zone tended to be uniform and competent so loss was minimal and samples represent the true nature of the mineralisation</li> <li>No relationship between sample recovery and grade is evident.</li> </ul>
Logging	<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> </ul>	<ul style="list-style-type: none"> <li>Samples represent half the core width, and are logged in detail to support appropriate Mineral Resource estimation at a later stage of exploration.</li> </ul>

Criteria	JORC Code explanation	Commentary
	<ul style="list-style-type: none"> <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>	
Sub-sampling techniques and sample preparation	<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> <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>	<ul style="list-style-type: none"> <li>Core is split in half using a core saw with the remaining half retained in the core tray.</li> <li>Mineralisation is massive and relatively uniform so assay samples closely represent the in-situ material.</li> <li>Samples were taken on an average of 1 metre intervals and were determined to be appropriate for the mineralised material being sampled</li> </ul>
Quality of assay data and laboratory tests	<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>All samples will be analysed by Actlabs in Thunder Bay, Ontario Canada a SCC (Standards Council of Canada) accredited laboratory.</li> <li>The assay technique will be FUS-Na2O2</li> <li>Quality control procedures included the insertion of certified standards and blanks into the sample stream.</li> <li>Results of the Heavy Liquid Separation tests are outlined in Table 3.</li> </ul>
verification of sampling and assaying	<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>Drill logs and sample information is documented and stored digitally in field laptop units and backed up on the Ardiden server.</li> </ul>
Location of data points	<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>Drill holes were located with handheld WAAS enabled handheld GPS units set for recording UTM NAD83 Zone 16N projection coordinates.</li> <li>Drill holes were orientated using the Reflex ACT II RD core orientation tool</li> </ul>



Criteria	JORC Code explanation	Commentary
<i>Data spacing and distribution</i>	<ul style="list-style-type: none"> <li>• <i>Data spacing for reporting of Exploration Results.</i></li> <li>• <i>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.</i></li> <li>• <i>Whether sample compositing has been applied.</i></li> </ul>	<ul style="list-style-type: none"> <li>• Core samples of the mineralised zone were taken at approximately 1 metre intervals and deemed appropriate to represent the in-situ nature of the mineralization.</li> <li>• Further drilling and sampling will be required to adequately establish the geologic and grade continuity for any Mineral Resource and Ore Reserve estimation procedure.</li> </ul>
<i>Orientation of data in relation to geological structure</i>	<ul style="list-style-type: none"> <li>• <i>Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.</i></li> <li>• <i>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.</i></li> </ul>	<ul style="list-style-type: none"> <li>• Drill hole locations were designed to intercept the mineralised zone as close to true width as possible to avoid sampling bias.</li> </ul>
<i>Sample security</i>	<ul style="list-style-type: none"> <li>• <i>The measures taken to ensure sample security.</i></li> </ul>	<ul style="list-style-type: none"> <li>• Samples were secured and delivered to the assay lab under chain of custody controls by the Caracle Creek Consulting group</li> </ul>
<i>Audits or reviews</i>	<ul style="list-style-type: none"> <li>• <i>The results of any audits or reviews of sampling techniques and data.</i></li> </ul>	<ul style="list-style-type: none"> <li>• No audits or reviews of sampling techniques have been conducted</li> </ul>

## Section 2 Reporting of Exploration Results

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

Criteria	JORC Code explanation	Commentary
<i>Mineral tenement and land tenure status</i>	<ul style="list-style-type: none"> <li>• <i>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.</i></li> <li>• <i>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.</i></li> </ul>	<ul style="list-style-type: none"> <li>• All claims in the Seymour Lake Lithium project are in good standing and these include claims 1245661 1245648 1245662 1245664 1245646, which are 100% owned by Stockport Exploration Inc. Ardiden has exercised option to acquire 100% ownership of the project claims. Ardiden staked and owns additional claims around the project including claims: 4270593, 4270594, 4270595, 4270596, 4270597, 4270598, 4279875, 4279876, 4279877, 4279878, 4279879, 4279880, 4279881, 4279882, 4279883, 4279884, 4279885, 4279886, 4279887, 4279888, 4279889, 4279890, 4279891, 4279869, 4279870, 4279871, 4279872, 4279873 and 4279874</li> </ul>
<i>Exploration done by other parties</i>	<ul style="list-style-type: none"> <li>• <i>Acknowledgment and appraisal of exploration by other parties.</i></li> </ul>	<ul style="list-style-type: none"> <li>• Other parties have not appraised the exploration carried out to date</li> </ul>

Criteria	JORC Code explanation	Commentary
<i>Geology</i>	<ul style="list-style-type: none"> <li><i>Deposit type, geological setting and style of mineralisation.</i></li> </ul>	<ul style="list-style-type: none"> <li>Seymour Lake area pegmatites have been classified as belonging to the Complex-type, Spodumene-subtype. Mineralization is dominated by spodumene (Li), with lesser tantalite(Ta) hosted in a series of variably steeply dipping pegmatite dykes and and sills.</li> </ul>
<i>Drill hole Information</i>	<ul style="list-style-type: none"> <li><i>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:</i> <ul style="list-style-type: none"> <li><i>easting and northing of the drill hole collar</i></li> <li><i>elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar</i></li> <li><i>dip and azimuth of the hole</i></li> <li><i>down hole length and interception depth</i></li> <li><i>hole length.</i></li> </ul> </li> <li><i>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.</i></li> </ul>	<ul style="list-style-type: none"> <li>See Table 1 and Figure 2 for the location of the drill collars and other dill hole information.</li> </ul>
<i>Data aggregation methods</i>	<ul style="list-style-type: none"> <li><i>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.</i></li> <li><i>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.</i></li> <li><i>The assumptions used for any reporting of metal equivalent values should be clearly stated.</i></li> </ul>	<ul style="list-style-type: none"> <li>With the homogeneity of the mineralised material, sample intervals for the most part were kept at one metre intervals</li> </ul>
<i>Relationship between mineralisation widths and intercept lengths</i>	<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 drill hole 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. ‘down hole length, true width not known’).</i></li> </ul>	<ul style="list-style-type: none"> <li>Mineralised zones were determined to be shallow dipping and drill holes were drilled at -60 degrees so that drilling orientation bias was minimised</li> </ul>
<i>diagrams</i>	<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</i></li> </ul>	<ul style="list-style-type: none"> <li>See Figure 2 for the location of the drill hole collars</li> </ul>

Criteria	JORC Code explanation	Commentary
	<i>appropriate sectional views.</i>	
<i>Balanced reporting</i>	<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 to avoid misleading reporting of Exploration Results.</li> </ul>	<ul style="list-style-type: none"> <li>No comprehensive report has been completed to date to include the latest Ardiden exploration results.</li> </ul>
<i>Other substantive exploration data</i>	<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>All meaningful and material data is reported</li> </ul>
<i>Further work</i>	<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>Refer to text within the report.</li> </ul>