

20 December 2013

## ST GEORGE IDENTIFIES STRONG EM ANOMALIES FOR NICKEL DRILLING

### HIGHLIGHTS:

- **Multiple strong electromagnetic (EM) anomalies identified on Stella Range Belt**
- **EM anomalies are well defined and situated within favourable geological settings**
- **Modelling of EM anomalies is underway to define drill targets**
- **EM survey and analysis is ongoing at the Stella Range Belt**

### HIGH QUALITY CONDUCTORS IDENTIFIED

St George Mining Limited (ASX: **SGQ**) ('St George Mining' or 'the Company') is pleased to announce that a number of electromagnetic (EM) anomalies have been identified by the ongoing moving loop EM (MLEM) survey of the Stella Range Ultramafic Belt. This Belt forms part of the Company's 100% owned East Laverton Property in the North Eastern Goldfields of Western Australia.

The interpretation of these EM anomalies is continuing with initial analysis suggesting they are consistent with bedrock conductors and are permissive of potential massive sulphide nickel mineralisation.

The MLEM survey at the Stella Range Belt is the first phase of a property-wide ground EM programme planned to test high priority nickel targets at the East Laverton Property. These nickel targets occur within all three of the extensive ultramafic belts at East Laverton, including the highly prospective Stella Range Belt where magmatic nickel sulphides have already been intersected by recent drilling.

Figure 1 illustrates the areas on the Stella Range Belt that will be covered by the first phase of the MLEM survey. The field component of the MLEM survey for the Cambridge and Desert Dragon North Prospects has now been completed. The field crew is currently surveying the northern portion of the Desert Dragon Prospect and will continue southwards to the Windsor Prospect.

The ground MLEM survey is a large, regional programme and represents a substantial commitment by St George to the nickel exploration of the East Laverton Property. Over 500 EM stations have been read so far in this MLEM survey, creating over 50,000 line metres of coverage.

**John Prineas, Executive Chairman of St George Mining**, said:

"The potential of the East Laverton Property as an emerging nickel field was supported by the results of reconnaissance drilling completed in 2012.

"We have now commenced systematic exploration at the prospect scale using electrical geophysics and diamond drilling to test for massive sulphide nickel mineralisation.

"The discovery of high quality EM anomalies along the Stella Range is very exciting.

"The tremendous potential of this property is starting to be revealed."

**DESERT DRAGON NORTH**

The survey data for Desert Dragon North has identified a series of strong anomalies that are located along a regional north-west trend that occurs through the prospect area. Decay curve analysis indicates high time-constants for these specific EM anomalies in the range of 120 ms to 200 ms. More localised conductive spikes can reach over 300 ms and are of specific interest.

The strongest anomaly is in the proximity of drill hole DDNRC002, which intersected 2m @ 1.08% Ni (see Table 1). This provides additional geological context for this EM anomaly as the stringer-vein nickel sulphides identified in DDNRC002 are interpreted to be a tectonic slice from a local ultramafic body containing nickel sulphides.

The identification of a strong EM anomaly in proximity to DDNRC002 is highly encouraging and justifies the classification of Desert Dragon North as a high priority nickel target.

The quality of the data being collected at Desert Dragon North is very high, with negligible interference from conductive overburden. This supports the integrity of the interpreted bedrock conductors and will allow for more accurate modelling.

The EM anomalies are interpreted to occur within ultramafic rocks inferred from drilling and are broadly co-incident with strong TMI (total magnetic intensity) responses. While it is possible for these EM anomalies to be due to a source other than massive sulphides, the Company believes there is a strong geological, geophysical and geochemical context for the potential of these EM responses to represent massive sulphides.

Detailed modelling of these EM anomalies will be completed prior to selection of drill targets for 2014.

HOLE ID	NORTHING (m)	EASTING (m)	DIP (deg)	AZM (deg)	DEPTH (m)	FROM (m)	TO (m)	WIDTH (m)	Ni (%)
DDNRC002	6742718	523717	-60	59	246	53	60	7	0.54
including						55	57	2	1.08

*Table 1 – details of drill hole DDNRC002*

**CAMBRIDGE**

The MLEM survey and FLEM (fixed loop electromagnetic) survey completed at the Cambridge prospect was mainly focused at the dunite body. Several EM anomalies have been identified at Cambridge with the most interesting anomaly being found to the east of the dunite body.

The anomaly sits in the prospect area known as Cambridge East. A time constant of 70 ms is estimated for this interpreted bedrock anomaly.

The Cambridge East Prospect remains an under-explored zone of the Stella Range Belt and the identification of an EM anomaly in this area is a demonstration of the prospectivity of Cambridge East. This is a zone interpreted to host thinner ultramafic and felsic sediments, a geological environment that hosts a number of high grade nickel sulphide deposits in the Agnew-Wiluna Belt.

Further analysis of the EM anomalies in the main dunite and marginal ultramafic facies will be completed.

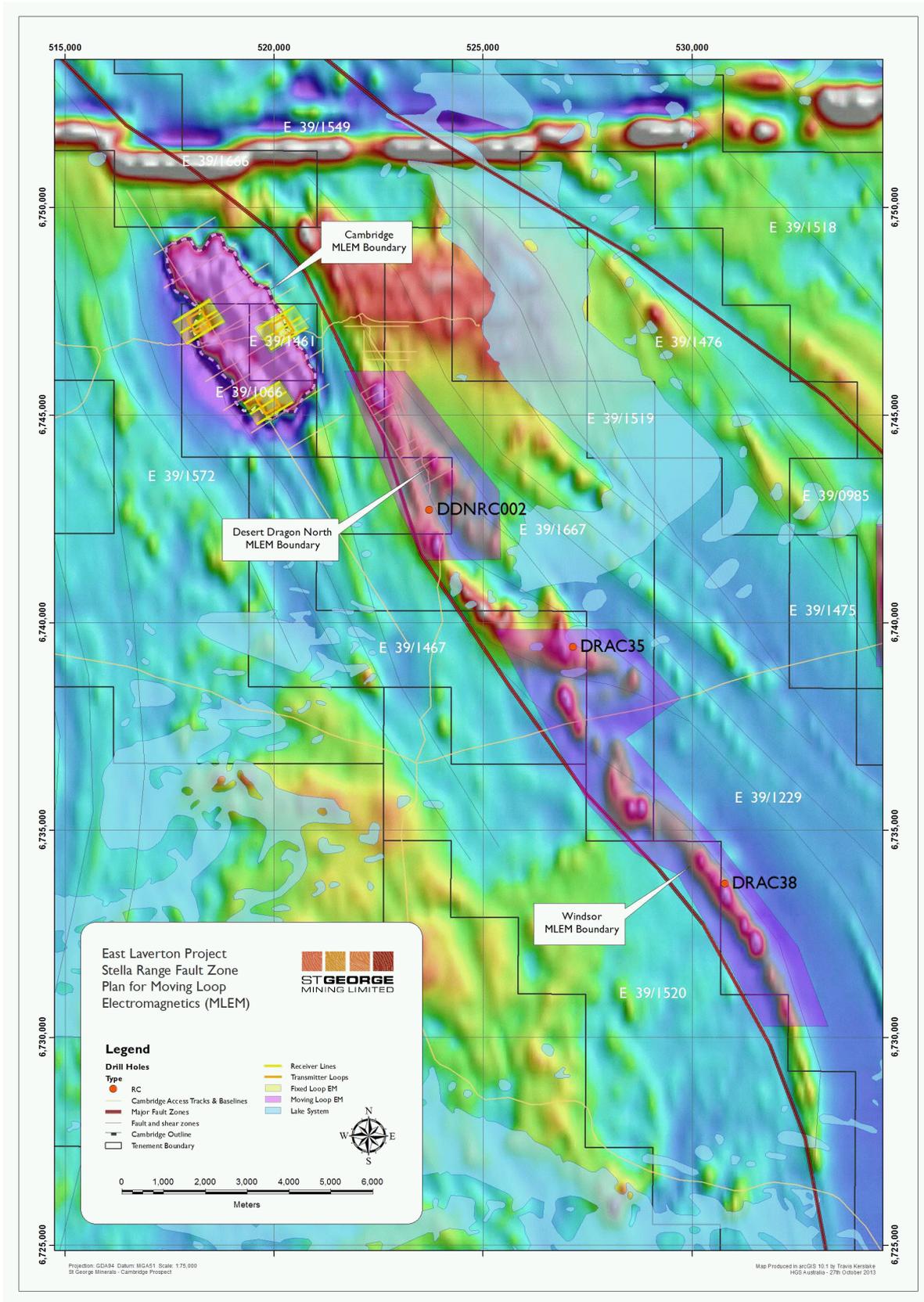


Figure 1 – this map illustrates the areas on the Stella Range Belt being covered by the MLEM survey currently underway

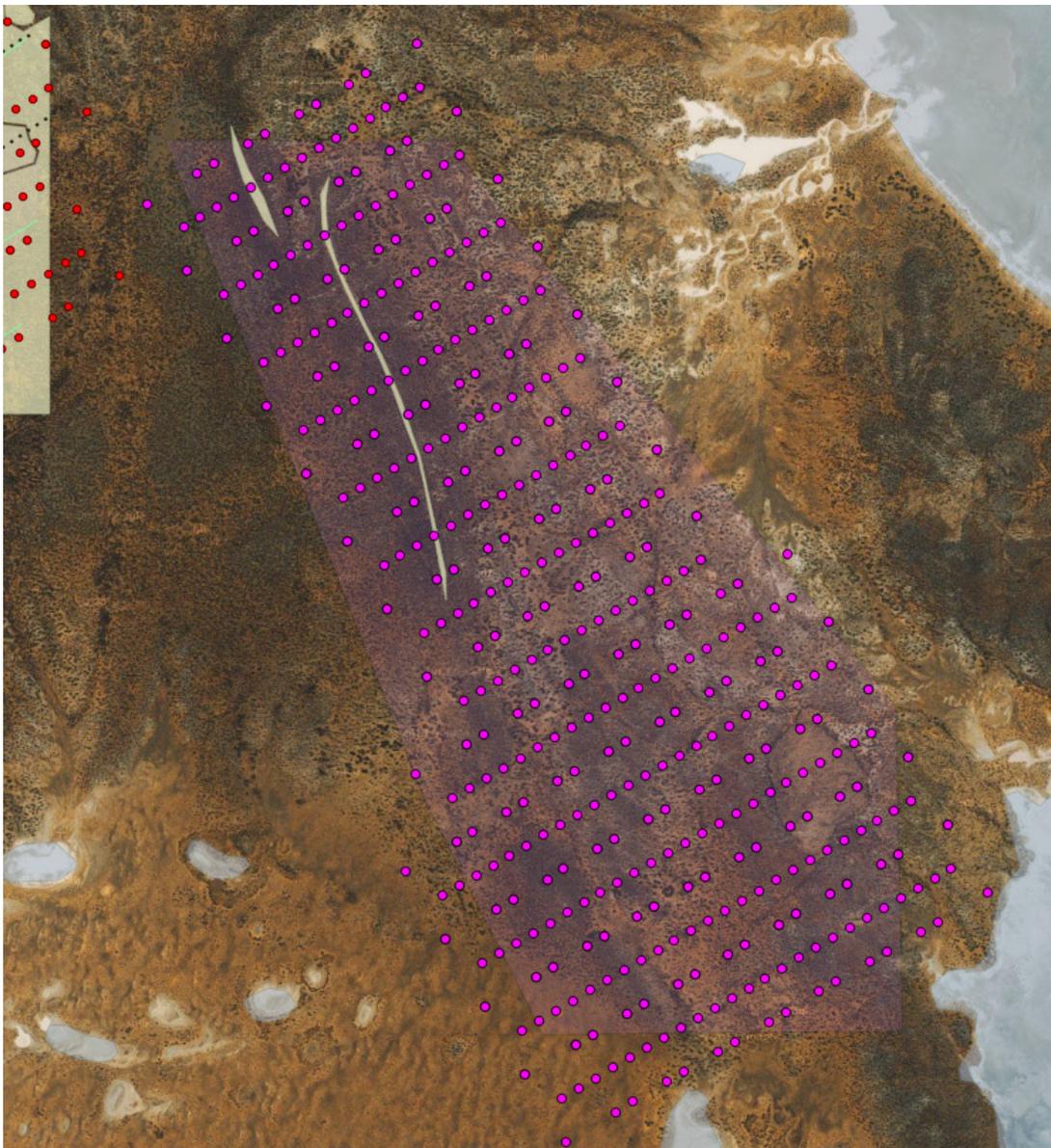
## ONGOING EM SURVEY

The MLEM survey over the Desert Dragon and Windsor Prospects is scheduled to be completed next month, following a short Christmas recess.

The survey will then focus on prospects in the far north and far south of the Stella Range Belt.

Interpretation of the survey data is ongoing. Infill surveys or extension surveys may be required to provide further data to allow completion of accurate modelling of the conductive anomalies. This modelling will help understand the geometry to the EM conductors and allow for the design of drill holes to test the EM targets for massive sulphide nickel mineralisation.

A further announcement will be made by the Company once the modelling of the EM conductors is completed, and this is anticipated for January 2014.



*Figure 2 – this map illustrates the MLEM transmitter stations (in purple) at Desert Dragon North over a Google earth background.*

## **MLEM SURVEY SPECIFICATIONS**

The MLEM survey is designed and managed by Newexco, with field work contracted to Bushgum Pty Ltd.

Key specifications of the MLEM survey are:

Stations Spacing:	100 m
Loop:	400 m
Components:	x y z
Orientation:	X along line (local east - positive).
Bearing:	Cambridge: 56.50. DD Nth: 56.50.
Frequency:	0.5, 0.125 Hz
Channels:	SMARTem Standard.
Receiver:	Fluxgate
Stacking:	64
Current:	Maximum for available power supply, typically 45 amperes.
Repeats:	Minimum 3 consistent readings per station.

**For further information, please contact:**

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### **Competent Person Statement:**

The information in this report that relates to Exploration Targets, Exploration Results, Mineral Resources or Ore Reserves is based on information compiled by Mr Tim Hronsky, a Competent Person who is a Member of The Australasian Institute of Mining and Metallurgy. Mr Tim Hronsky is employed by Essential Risk Solutions Ltd which has been retained by St George Mining Limited to provide technical advice on mineral projects.

Mr Tim Hronsky 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'. Mr Tim Hronsky consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

The following section is provided for compliance with requirements for the reporting of exploration results under the JORC Code, 2012 Edition.

## Section 2 Reporting of Exploration Results

Criteria	JORC Code explanation	Commentary
<b>Mineral Tenement and Land Status</b>	<p>Type, name/reference number, location and ownership including agreements or material issues with third parties including joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings.</p> <p>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.</p>	<p>The moving loop electromagnetic (MLEM) survey discussed in this ASX Release has covered areas that are within Exploration Licences E39/1461, E39/1066, E39/1667, E39/1467, E39/1520 and E39/1229 which are part of the Company's East Laverton Property in the NE Goldfields.</p> <p>Each tenement is 100% owned by Desert Fox Resources Pty Ltd, a wholly owned subsidiary of St George Mining. E39/1229 and E39/1467 are subject to a 2% Net Smelter Royalty in favour of a third party.</p> <p>None of the tenements are the subject of a native title claim.</p> <p>No environmentally sensitive sites have been identified at any of the tenements.</p> <p>The tenements are in good standing and no known impediments exist.</p>
<b>Exploration Done by Other Parties</b>	<p>Acknowledgment and appraisal of exploration by other parties.</p>	<p>In 2012, BHP Billiton Nickel West Pty Ltd (Nickel West) completed a reconnaissance RC (reverse circulation) drilling programme as part of the Project Dragon farm-in arrangement between Nickel West and the Company. That farm-in arrangement has been terminated.</p> <p>The results from the Nickel West drilling programme were reported by the Company in its ASX Release dated 25 October 2012 "Drill Results at Project Dragon".</p> <p>Drilling intersected primary nickel sulphide mineralisation and established the presence of fertile, high MgO ultramafic sequences at the East Laverton Property.</p> <p>Prior to the Project Dragon drilling programme, there was no systematic exploration for nickel sulphides at the East Laverton Property.</p> <p>Historical exploration in the region was dominated by shallow RAB and aircore drilling, much of which had been incompletely sampled, assayed, and logged. This early work was focused on gold rather than nickel sulphide exploration.</p> <p>An EM survey was completed in 1999 by Savanna Mineral Resources Pty Ltd over areas that are now within E39/1066 and E39/1461. The Company is not relying on any of the results from this EM survey which is considered by the Company to have been ineffectual to properly investigate EM anomalies due to its shallow depth of penetration from surface.</p>
<b>Geology</b>	<p>Deposit type, geological setting and style of mineralisation</p>	<p>The East Laverton Property is located in the NE corner of the Eastern Goldfields Province of the Archean Yilgarn Craton of Western Australia.</p> <p>The project area is proximally located to the Burtville-Yarmana terrane boundary and the paleo-cratonic marginal setting is consistent with the extensive komatiites and carbonatite magmatism found on the property.</p> <p>The area is largely covered by Permian glaciogene sediments (Patterson Formation), which is subsequently overlain by a thinner veneer of more recent sediments and aeolian sands.</p>

Criteria	JORC Code explanation	Commentary
		<p>The geological knowledge of the belt has previously been largely inferred from gravity and magnetic data and locally verified by drill-hole information and multi-element soil geochemical surveys.</p> <p>The drilling at the East Laverton Property has confirmed extensive strike lengths of thick (up to 700 - 800m) high-MgO olivine-rich rocks across three major ultramafic belts. Ultramafic rocks of this composition are known to host high grade nickel sulphides.</p>
<b>Drill hole information</b>	<p>A summary of all information material to the understanding of the exploration results including tabulation of the following information for all Material drill holes:</p> <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 meters) 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>	<p>This ASX Release relates to electromagnetic surveys currently underway at the East Laverton Property.</p> <p>Drill hole information, except as referred to in the body of the ASX Release, is not applicable.</p>
<b>Data aggregation methods</b>	<p>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.</p>	Not applicable.
	<p>Where aggregated 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.</p>	Not applicable.
	<p>The assumptions used for any reporting of metal equivalent values should be clearly stated.</p>	Not applicable.
<b>Relationship between mineralisation widths and intercept lengths</b>	<p>These relationships are particularly important in the reporting of exploration results.</p> <p>If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported. 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').</p>	Not applicable.
<b>Diagrams</b>	<p>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 plane view of drill hole collar locations and appropriate sectional views.</p>	Relevant maps are included in the body of the ASX Release.
<b>Balanced Reporting</b>	<p>Where comprehensive reporting of all Exploration Results is not practical, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results.</p>	The MLEM survey is ongoing and only interim results can be reported at this stage.

Criteria	JORC Code explanation	Commentary
<p><b>Other substantive exploration data</b></p>	<p><i>Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observation; 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></p>	<p><i>All meaningful and material information has been included in the body of the ASX Release.</i></p>
<p><b>Further Work</b></p>	<p><i>The nature and scale of planned further work (e.g. tests for lateral extensions or depth extensions or large – scale step – out drilling).</i></p> <p><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></p>	<p><i>The MLEM survey is ongoing. Drill targets will be selected once the survey is completed and EM anomalies are modelled. Further discussion on future exploration is included in the body of the ASX Release.</i></p>