MALAGASY MINERALS LIMITED
ABN 84 121 700 105

18th January 2014 **ASX Announcement** **ASX:MGY**

CONFIRMATION OF NICKEL-COPPER-PGM POTENTIAL

100% owned Ampanihy Project – Southern Madagascar

HIGHLIGHTS

- Systematic regional geochemical sampling and programs of mapping have identified an extensive suite of mafic-ultramafic intrusive rocks associated with the regionally significant Ampanihy Suture Zone in the southern Maniry Area;
- Extensive zones of coincident nickel-copper soil geochemistry associated with a number of the intrusions have been defined;
- Rock chip results from gossanous material in outcropping positions have returned results consistent with the presence of sulphides containing nickel-copper-platinum group metals. Results include:
  - Sample MD9306: ***3722ppm Ni, 1666ppm Cu, 156ppb Pt-Pd***
  - Sample MD9303: ***3650ppm Ni, 308ppm Cu, 260ppb Pt-Pd***
  - Sample MD9286: ***1606ppm Ni, 469ppm Cu, 75ppb Pt-Pd***
  - Sample MD9287: ***1184ppm Ni, 661ppm Cu, 125ppb Pt-Pd***

BACKGROUND

Malagasy Minerals Limited (ASX Code: MGY / "Malagasy") has established a large exploration project in Southern Madagascar that is prospective for both mafic-ultramafic intrusive related nickel-copper-platinum group metals (PGM) deposits and high-grade high-quality graphite deposits (Figure 1). This is being undertaken both on a 100% basis and through joint venture.

The Ampanihy Project has been confirmed as a host for a significant suite of mafic-ultramafic intrusive rocks that have demonstrated potential to host nickel-copper-PGM mineralisation. Having established that the application of systematic regional geochemical sampling and programs of mapping and rock chip sampling is the most effective way of exploring the entire 110km strike of the project a work program involving the collection of approximately 4,000 soil samples has been completed across the entire project. 50% of these samples covering the southern half of the project have now been analysed: the results of which have confirmed the potential of the project to host a significant mafic-ultramafic intrusive related Ni-Cu-PGM deposit.

NICKEL-COPPER-PGM EXPLORATION RESULTS

Exploration for NI-Cu-PGM has been focused along a major documented structural zone referred to as the ***"Ampanihy Suture Zone".*** This feature has been the focus of a substantial intrusive event that has seen a suite of intrusive rocks ranging from anorthosite, through gabbro to ultramafic peridotite and dunite. These intrusive rocks are now referred to as the ***"Ampanihy Plutonic Suite".*** This geological setting is interpreted to be analogous to that described at Voisey's Bay.

Key results of the recent exploration initiative include:

- Identification of 4 clusters of mafic-ultramafic intrusive rocks in close proximity to the Ampanihy Suture Zone. Individual intrusions are up to ~5km long but are more typically ~2km long (Figure 2);
- Strong coincident Ni-Cu geochemical anomalies associated with a number of the intrusions; and

- Identification of a zone of outcropping strongly gossanous material (semi-oxidised to oxidized rock) that has returned highly anomalous nickel, copper, platinum, palladium and sulphur results from rock chip samples from “Target C” (Figure 3).

Table 1: Results of Rock Chip Samples

Sample No	*Nickel (ppm)*	*Copper (ppm)*	*Platinum (ppb)*	*Paladium (ppb)*	*Sulphur (ppm)*
MD9306	3722	1666	129	27	5430
MD9303	3650	308	44	216	1757
MD9286	1606	469	39	36	3537
MD9287	1184	661	68	57	11794

Note:
Assaying of rock chips was undertaken by Intertek-Genalysis in Perth. Samples were pulverized, representatively sampled, digested by 4 acids and then analyzed by mass spectrometer for 53 elements including PGE’s. Internal laboratory QAQC procedures were adhered to with results later checked by the MGY Senior Geologist.

XRF analysis of the soil samples was undertaken with a handheld Innov-X Delta Premium XRF unit. The machine was routinely calibrated and CRM material inserted into sample runs for QAQC purposes. Reading time varied for different batches of samples between 30 seconds or 90 seconds (3 beams). Data was routinely checked with internal QAQC standards met.

See Appendix (2) for JORC Code 2012 Edition commentary on Sampling Techniques and Data

See Appendix (1) for full details.

Given the tenor of the results, and including the levels of sulphur, it is likely that the results are related to the presence of nickel-copper-PGM sulphides. Petrographic analysis is currently underway to confirm this.

These results have now identified an advanced high priority target. The “Target C” mafic ultramafic intrusion represents a ~2km long by ~0.5-0.8km wide mafic-ultramafic intrusion that has a strong coincident Ni-Cu anomaly surrounding it and an identified zone of gossanous material that is highly anomalous in Ni-Cu-Pt-Pd-S; likely to be related to sulphide mineralisation.

These results clearly demonstrate that a highly prospective suite of mafic-ultramafic intrusive rocks has been identified in the southern half of Malagasy Mineral Ampanihy Project and that the application of low-cost, high-value exploration techniques has been effective.

FUTURE WORK

- The remainder of the soil and rock chip samples that were collected over the northern part of property are currently being analysed using a portable XRF. High tenor results will then be re-submitted for laboratory analysis. Results of this work will be reported as they come to hand;
- Petrographic analysis of samples to identify sulphides;
- Following the end of the wet season (March) an initial program of detailed mapping and sampling of each of the defined target areas will be undertaken; and
- Based on results geophysical programs of airborne magnetics and ground based electromagnetic will be considered.

For and on behalf of the Board

Peter Langworthy
Technical Director

Competent Persons Statement

The information in this report that relates to Exploration Results or Mineral Resources is based on information compiled or reviewed by Mr. Peter Langworthy, Consulting Geologist, who is a Member of the Australian Institute of Mining and Metallurgy. Mr. Peter Langworthy is a full time Director of Malagasy Minerals Limited and has sufficient experience, which is relevant to the style of mineralisation and types of deposit under consideration and to the activities undertaken, to qualify as a Competent Person as defined in the 2012 Edition of the "Australasian Code of Reporting of Exploration Results, Mineral Resources and Ore Reserves". Mr. Peter Langworthy consents to the inclusion in the report of the matters based on the information in the form and context in which it appears.

Figure (1) – Regional Location Plan

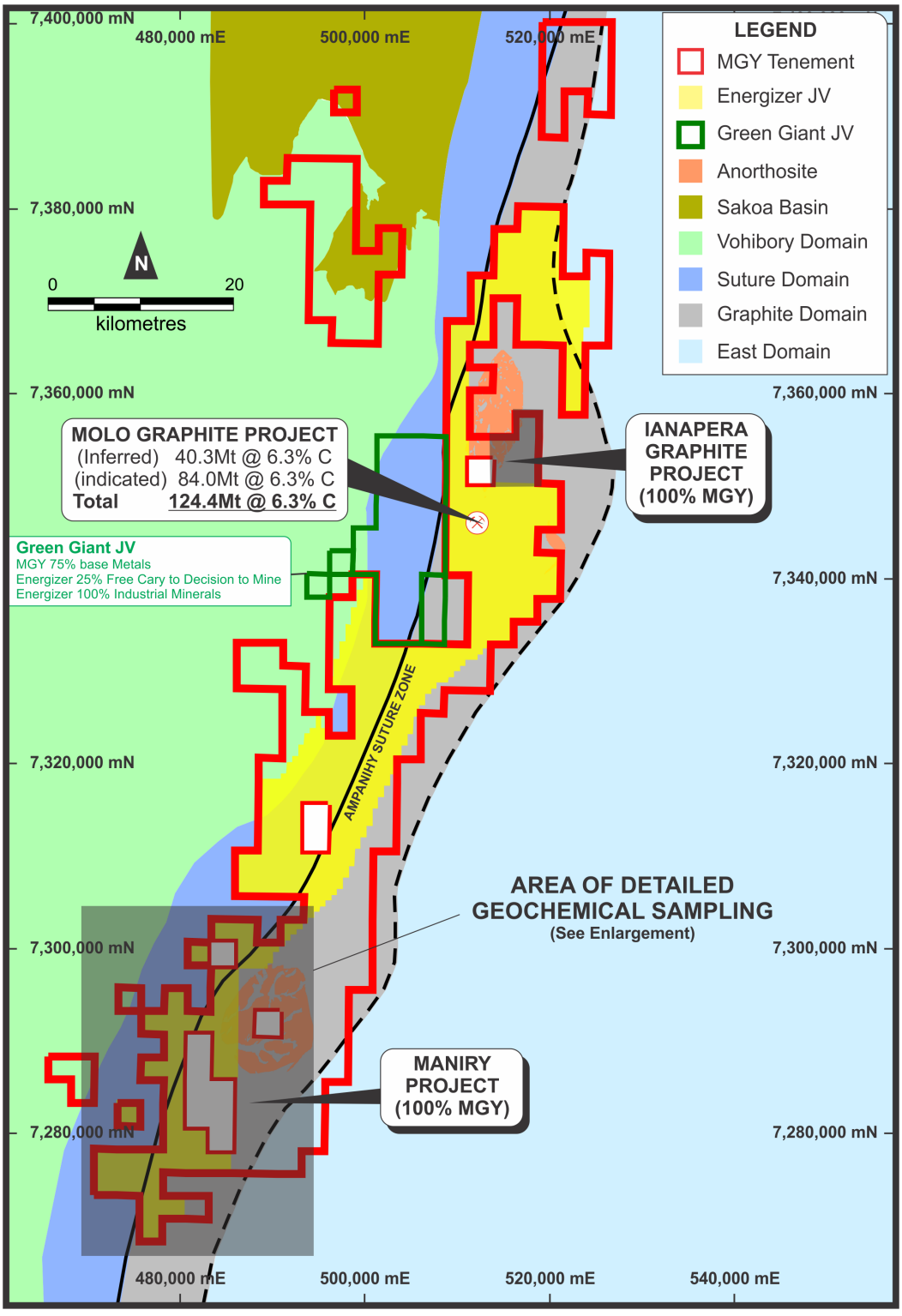


Figure (2) –Location Plan: Southern Ampanihy Project

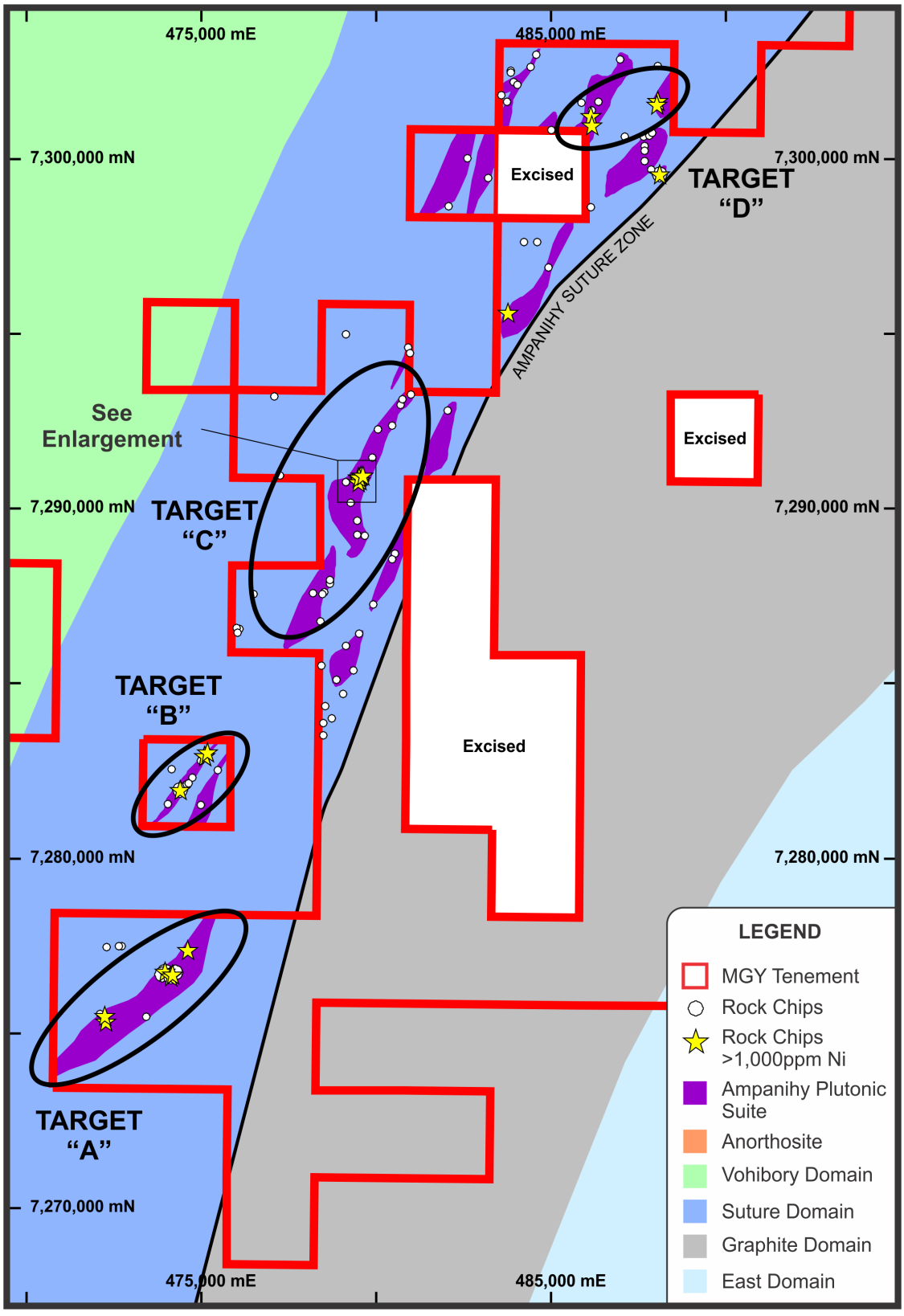
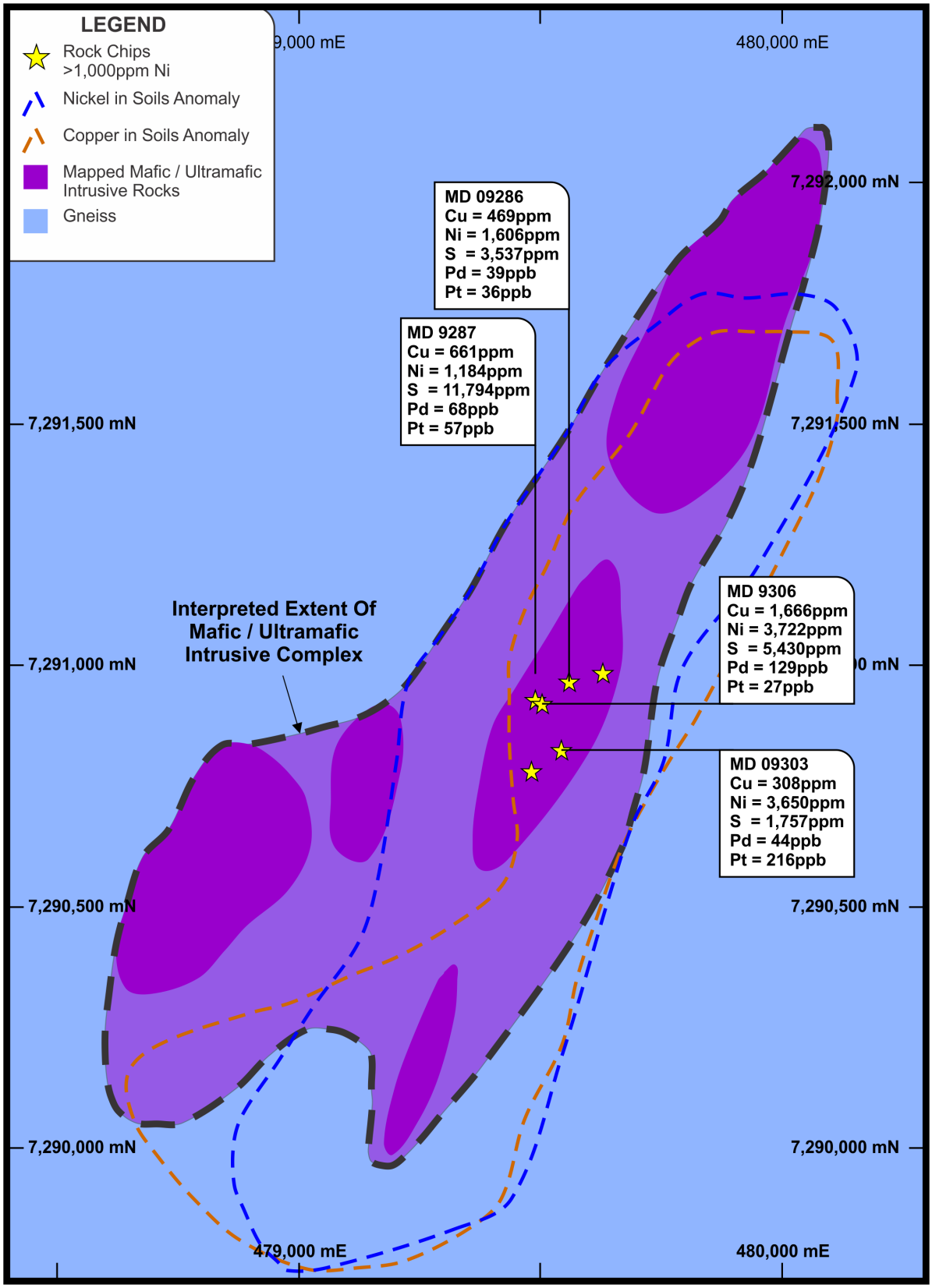


Figure (3) – Target C: Schematic Geology and Rock Chip Results



APPENDIX (1) – Target C Rock Chip Sampling Details

Sample No.	Easting	Northing	Ni_ppm	Cu_ppm	Pd_ppb	Pt_ppb	S_ppm	Co_ppm	Cr_ppm
MD09261	474433	7282039	1669	33	2	6	57	82.3	1537
MD09271	475141	7283001	1126	64	3	5	605	96.9	2587
MD09272	475129	7283003	2281	255	64	10	7748	107.4	2055
MD09273	475126	7283001	1304	78	14	12	3340	122.5	3149
MD09274	475220	7283109	1078	113	7	6	7310	61.4	1369
MD09286	479559	7290966	1606	469	37	36	3537	64.2	133
MD09287	479490	7290929	1184	661	68	57	11794	97.8	206
MD09288	483747	7295604	1122	17	8	14	211	54.2	2427
MD09303	479544	7290826	3650	308	44	216	1757	242.2	379
MD09305	479481	7290782	1980	215	18	46	2510	31.2	175
MD09306	479503	7290921	3722	1666	129	27	5430	114.3	128
MD09308	479630	7290985	1810	79	7	12	407	67.9	4242
MD09317	487990	7301602	2223	21	5	7	445	97.6	2966
MD09321	487955	7301506	1368	21	8	9	527	61.5	2795
MD09325	474652	7277493	1729	21	11	11	1365	87.2	1163
MD09332	473993	7276898	1526	7	2	8	993	90	6169
MD09334	474154	7276764	1659	11	12	17	106	132.2	2245
MD09335	474219	7276818	1314	1276	10	53	17466	298	427
MD09342	472318	7275482	1316	13	4	6	386	144.1	4081
MD09343	472306	7275634	1018	39	11	10	395	59.6	2163
MD09466	488028	7299538	1672	36	3	5	671	71.3	1305

JORC Code, 2012 Edition – Table 1 report template

Section 1 Sampling Techniques and Data

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

Criteria	JORC Code explanation	Commentary
Sampling techniques	• *Nature and quality of sampling (eg cut channels, random chips, or specific 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.* • *Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.* • *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.*	• Soil samples – 4110 collected – were taken on a pre-designated grid with GPS used to locate the sample location. A representative piece of ground was chosen in the vicinity of the location with any loose debris and vegetation removed. The top 5cm of 'topsoil' was removed from an area measuring 50 x 50cm with a further pit dug within with the resultant soil suitably homogenized. Soil was then sieved to 177µm (#80 mesh) with approximately 120g of sample collected in a paper bag and stored appropriately. • Rock chips – 204 collected - were taken from locations identified as prospective by the field geologist. Approximately 2.5kg of sample was taken and placed in a calico bag. Samples may have been from one single point or from a number of points within a 5-10m radius • An Innov-X Delta Premium XRF analyzer was used to analyze all soil samples whilst rock chips were assayed at a laboratory.
Sub-sampling techniques and sample preparation	• *If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.* • *For all sample types, the nature, quality and appropriateness of the sample preparation technique.* • *Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.* • *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.* • *Whether sample sizes are appropriate to the grain size of the material being sampled.*	• All samples were dry at point of collection • Field QC procedures for all soil and rock chip sampling programs involve the use of Certified Reference Material (CRM) as assay standards and field duplicate samples at a frequency of 1 in every 30 samples. • All QA/QC controls and measures are routinely reviewed and reported on at the completion of the program. • External laboratory QA/QC checks are routinely monitored and stored in the MGY database. • Sample size is considered adequate for the rocks encountered, mineralization style and purpose of this program.
Quality of assay data and laboratory tests	• *The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.* • *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.*	• Assaying of rock chips was undertaken by Intertek-Genalysis in Perth. Samples were pulverized, representatively sampled, digested by 4 acids and then analyzed by mass spectrometer for 53 elements including PGE's. Internal laboratory QAQC procedures were adhered to with results later checked by the MGY Senior Geologist. • XRF analysis of the soil samples was

Criteria	JORC Code explanation	Commentary
	• *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.*	undertaken with a handheld Innov-X Delta Premium XRF unit. The machine was routinely calibrated and CRM material inserted into sample runs for QAQC purposes. Reading time varied for different batches of samples between 30 seconds or 90 seconds (3 beams). Data was routinely checked with internal QAQC standards met.
Verification of sampling and assaying	• *The verification of significant intersections by either independent or alternative company personnel.* • *Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.* • *Discuss any adjustment to assay data.*	• Data collected has been verified by both MGY Geologists and Consultants OMNI GeoX Pty. Ltd. • Malagasy internal procedures that meet Western Australian industry standards were adhered to during all sampling. • All XRF analysis was undertaken by OMNI GeoX Pty. Ltd. and adhered to internal procedures. • Assay and XRF data has been collected electronically and stored within a database. • No data has been adjusted.
Location of data points	• *Accuracy and quality of surveys used to locate drill holes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation.* • *Specification of the grid system used.* • *Quality and adequacy of topographic control.*	• Sample location and altitude was recorded with handheld GPS with an accuracy of ±4m horizontally. • The grid system used was UTM Zone 38S (WGS 84)
Data spacing and distribution	• *Data spacing for reporting of Exploration Results.* • *Whether sample compositing has been applied.*	• Soil samples were taken on a 1000m x 100m grid • Rock chips were at the field geologists discretion • No samples have been composited
Orientation of data in relation to geological structure	• *Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.*	• Soil traverses were orientated across/perpendicular to the main geological trend.
Sample security	• *The measures taken to ensure sample security.*	• During collection, samples were stored appropriately on site under the supervision of the Senior Geologist before being transferred to the in country office in Antananarivo. Samples were then freighted by DHL to Perth where they were held by Intertek-Genalysis laboratories for quarantine and some analysis before being transferred to Omni GeoX Pty. Ltd. warehouse for further analysis.
Audits or reviews	• *The results of any audits or reviews of sampling techniques and data.*	• No reviews or audits have been undertaken at this point.

Section 2 Reporting of Exploration Results

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

Criteria	JORC Code explanation	Commentary
Mineral tenement and land tenure status	• *Type, reference name/number, location and ownership including agreements or material issues with third parties such as joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings.* • *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.*	• Work was undertaken upon permits: 21059, 21064, 13832, 16753, 38323, 38324, 21062, 19003, 16747, 21063, 28346, 31735, 21061, 14619, 38469, 38392, 25605, 38392, 31734, 25606, 21060, 13811, 3432 • The tenements are located within the inland South West of Madagascar approximately centered on the townships of Fotradrevo and Ampanihy. • Tenements are held 100% by Mada Aust Ltd. A wholly owned subsidiary of Malagsay Minerals Ltd. • Energizer Resources Inc. (TSX) holds a 75% interest in all Industrial Minerals. To be clear this does not include any base or precious metals. • No overriding royalties are in place • There is no native title agreement required • Tenure does not coincide with any historical sites or national parkland • Semi-arid, thinly vegetated, relatively flat to low lying hills with sub-cropping rock. • Tenements are currently secure and in good standing.
Exploration done by other parties	• *Acknowledgment and appraisal of exploration by other parties.*	• Regional mapping undertaken by BRGM. • No other available data.
Geology	• *Deposit type, geological setting and style of mineralisation.*	• The deposit type and mineralization style being explored for is Mafic-Ultramafic intrusive related Ni-Cu-PGE sulphides. • The project overlies a prominent 20km wide zone of folded and assemblage of graphite and quartz-feldspar schists (<60% graphite), quartzite and marble units, with lesser intercalated amphibolite and leucogneiss. This zone, termed the Ampanihy Belt is a core component of the Neoproterozoic Graphite System. The belt is interpreted as a ductile shear zone accreted from rocks of both sedimentary and volcanic origin.
Data aggregation methods	• *In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (eg cutting of high grades) and cut-off grades are usually Material and should be stated.*	• For the purpose of reporting a minimum cutoff grade for rock chips has been established at 1000ppm Ni.
Diagrams	• *Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported These should include, but not be limited to a plan view of drill hole collar locations and appropriate*	• See embedded diagrams and tables within body of text.

Criteria	JORC Code explanation	Commentary
	sectional views.	
Balanced reporting	• *Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results.*	• Refer to body of text.
Other substantive exploration data	• *Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; geochemical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances.*	• No other pertinent exploration data to be reported.
Further work	• *The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling).* • *Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.*	• Refer to body of text