

ASX ANNOUNCEMENT ENCOURAGING MINERALOGY RESULTS AT AMBATO

HIGHLIGHTS:

- Bastnasite is the main REE-bearing mineral detected by QEMSCAN
- TREO grades of 5.02 to 5.38% in rock-chip sample
- Bastnasite is predominantly present as well liberated particles.

Minbos Resources Limited (Minbos) is pleased to advise that recent mineralogical characterisation and assessment testwork has been completed by ANSTO Minerals in Sydney on a rockchip sample collected from the Ankazohambo prospect during a recent site visit to the Ambato Project in December 2017. ANSTO Minerals is an international mining consultancy group with world-leading expertise in rare earth processing.

Chemical Analysis

Chemical analysis by XRF produced a total rare earth oxide (TREO) grade of 5.38% (Table 1). The sample was also digested and analysed by ICP-OES/ICP-MS, which produced a TREO grade of 5.02% (Table 2).

Table 1: Chemical Analysis of the Ankazohambo Rockchip Sample by XRF (wt%).

La	Ce	Pr	Nd	Sm	Eu	Gd	Tb
1.22	2.19	0.23	0.7	0.072	0.022	0.022	0.008
La ₂ O ₃	CeO₂	Pr ₆ O ₁₁	Nd ₂ O ₃	Sm ₂ O ₃	Eu ₂ O ₃	Gd₂O₃	Tb ₄ O ₇
1.43	2.69	0.28	0.82	0.08	0.03	0.03	0.01
Dy	Но	Er	Tm	Yb	Lu	Y	TREE
<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	0.013	4.46
Dy ₂ O ₃	Ho ₂ O ₃	Er ₂ O ₃	Tm_2O_3	Yb ₂ O ₃	Lu ₂ O ₃	Y_2O_3	TREO
<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	0.02	5.38

TREE: Total rare earth element TREO: Total rare earth oxide



Table 2: Chemical Analysis of the Ankazohambo Rockchip Sample by Digest followed by ICP-OES/ICP-MS (wt%)

La	Ce	Pr	Nd	Sm	Eu	Gd	Tb
1.2	2.03	0.22	0.62	0.064	0.012	0.022	0.001
La ₂ O₃	CeO ₂	Pr ₆ O ₁₁	Nd ₂ O ₃	Sm ₂ O ₃	Eu ₂ O ₃	Gd₂O₃	Tb ₄ O ₇
1.41	2.49	0.27	0.72	0.07	0.01	0.03	0.00
Dy	Но	Er	Tm	Yb	Lu	Y	TREE
0.004	<0.001	<0.001	<0.001	<0.001	<0.001	0.011	4.19
Dy ₂ O ₃	Ho ₂ O ₃	Er ₂ O ₃	Tm_2O_3	Yb ₂ O ₃	Lu ₂ O₃	Y ₂ O ₃	TREO
0.004	<0.001	<0.001	<0.001	<0.001	<0.001	0.01	5.02

TREE: Total rare earth element TREO: Total rare earth oxide

QEMSCAN

QEMSCAN particle mineralogical analysis (PMA) was carried out using a Quanta 650 electron microscope with dual Bruker XFlash 5030 energy dispersive detectors, controlled by iDiscover and iMeasure image analysis hardware/software.

The QEMSCAN results show that quartz (91wt%) is the dominant mineral constituent in the sample. Minor mineral constituents include bastnasite (3.1 wt%), Fe-oxide/hydroxide (1.5 wt%) and barytes (1.1 wt%).

Bastnasite is the main REE-bearing mineral detected by QEMSCAN, with a trace amount of monazite (0.3 wt%) also present. Monazite represents <8% of the REE-bearing minerals detected.

Greater than 75% of the bastnasite is contained in grains that have a degree of liberation of 80-100%.

Thorium is present in the sample in thorite (0.009 wt% by QEMSCAN) and is also present in varying concentrations within the REE-containing minerals bastnasite and monazite.

Scanning Electron Microscopy

SEM and X-ray microanalysis were carried out on epoxy resin impregnated portions of the sample using a Quanta 650F electron microscope with dual Bruker XFlash 5030 energy dispersive detectors. The SEM was operated at an accelerating voltage of 15 keV with a working distance of 13 mm and using a beam current of approximately 10 nA.

Results showed that quartz is the dominant mineral phase in the sample and bastnasite is present as a minor constituent and is the main REE-bearing mineral and is predominantly present as liberated particles.

Implications for Processing

Results from the ANSTO mineralogical characterisation and assessment indicate that the composition of the Ankazohambo rockchip sample is favourable with a relatively low amount of



metallic impurities. The major gangue mineral is quartz, the majority of which could be removed by beneficiation.

Competent Person

The information in this release that relates to mineralogy and metallurgy results as provided to Minbos by the Australian Nuclear Science and Technology Organisation (ANSTO), has been reviewed by Mr Gavin Beer who is a Member of The Australasian Institute of Mining and Metallurgy and a Chartered Professional. Mr Beer is a Consulting Metallurgist with sufficient experience relevant to the activity which he is undertaking to be recognised a Competent Person as defined in the 2012 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves" and as a "Qualified Person" under National Instrument 43-101 – Standards of Disclosure for Mineral Projects ("NI 43-101"). Mr Beer consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

The information in this Report that relates to Exploration Results and Data Quality is based on, and fairly represents, information and supporting documentation prepared by Rebecca Morgan, who is a member of the Australian Institute of Geoscientists. Miss Morgan was previously a fulltime employee of Minbos (until February 2018) and is a consultant to Minbos. Miss Morgan has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity she 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'. Miss Morgan consents to the inclusion in this Report of the matters based on her information in the form and context in which it appears.

Cautionary Note Statement

Certain statements contained in this announcement constitute forward looking statements within the meaning of applicable securities laws including, among others, statements made or implied relating to the Company's objectives, strategies to achieve those objectives, the Company's beliefs, plans, estimates and intentions, and similar statements concerning anticipated future events, results, circumstances, performance or expectations that are not historical facts. Forward looking statements generally can be identified by words such as "objective", "may", "will", "expect", "likely", "intend", "estimate", "anticipate", "believe", "should", "plans" or similar expressions suggesting future outcomes or events. Such forward looking statements are not guarantees of future performance and reflect the Company's current beliefs based on information currently available to management. Such statements involve estimates and assumptions that are subject to a number of known and unknown risks, uncertainties and other factors inherent in the business of the Company and the risk factors discussed in the materials filed with the securities regulatory authorities from time to time which may cause the actual results, performance or achievements of the Company to be materially different from any future results, performance or achievements expressed or implied by such forward looking statements. Those risks and uncertainties include, but are not limited to: the mining industry (including operational risks; risks in exploration, and development; the uncertainties involved in the discovery and delineation of mineral deposits, resources or reserves; and the uncertainty of mineral resource and mineral reserve estimates); the risk of rare earths, phosphate and other commodity price and foreign exchange rate fluctuations; the ability of the Company to



fund the capital and operating expenses necessary to achieve the business objectives of the Company; joint venture risks; the uncertainty associated with commercial negotiations and negotiating with foreign governments; the risks associated with international business activities; risks related to operating in Madagascar and or Angola; environmental risk; the dependence on key personnel; and the ability to access capital markets.

Readers are cautioned not to place undue reliance on these forward looking statements, which speak only as of the date the statements were made and readers are advised to consider such forward looking statements in light of the risks set forth above. Except as required by applicable securities laws, the Company assumes no obligation to update or revise any forward looking statements to reflect new information or the occurrence of future events or circumstances.

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About Minbos

Minbos Resources Limited (**ASX: MNB**) is an ASX-listed exploration and development company with interests in phosphate ore within the Cabinda Province of Angola and Rare Earth Elements in Madagascar.

The Company's strategy is to specifically target the exploration and development of low cost mineral projects.

For more information, visit www.minbos.com .



Appendix 1: JORC Code, 2012 Edition – Table 1

AMBATO RARE EARTH PROJECT

Section 1 Sampling Techniques and Data

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.	A composite surface rockchip sample was collected from several bastnaesite outcrops at the Ankazohambo prospect.
	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.	
Drilling techniques	Drill type (eg core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (eg core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc).	Not applicable.
Drill sample recovery	 Method of recording and assessing core and chip sample recoveries and results assessed. Measures taken to maximise sample recovery and ensure representative nature of the samples. 	Not applicable.



Criteria	JORC Code explanation	Commentary
	 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. 	
Logging	 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. Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography. The total length and percentage of the relevant intersections logged. 	Not applicable.
Sub-sampling techniques and sample preparation	 If core, whether cut or sawn and whether quarter, half or all core taken. 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. 	Rockchip samples were collected using a geological hammer. Rockchip samples were collected from several bastnaesite outcrops at the Ankazohambo prospect and combined into a single sample. No QAQC samples were submitted. No field duplicates were collected. Sample size is appropriate.
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 	The sample was submitted to ANSTO Minerals in Sydney for mineralogical characterisation and assessment. The following analyses were carried out on the sample. • QEMSCAN • Scanning Electron Microscopy • XRF



Criteria	JORC Code explanation	Commentary
Verification of sampling and assaying	 applied and their derivation, etc. 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. The verification of significant intersections by either independent or alternative company personnel. The use of twinned holes. Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols. Discuss any adjustment to assay data. 	● ICP/OES/MS No geophysical tools, spectrometers, handheld XRF instruments have been used in the analysis. No, duplicates, or external laboratory checks were submitted. Not applicable. Laboratory assay results were converted from ppm into oxides using the following oxide conversion factors: Oxide Conversion Factor La₂O₃ 1.1728 CeO₂ 1.2284 Pr ₆ O₁1 1.2082 Nd₂O₃ 1.1664 Sm₂O₃ 1.1596 Eu₂O₃ 1.1579 Gd₂O₃ 1.1579 Gd₂O₃ 1.1526 Tb₄Oァ 1.1762
		Tb ₄ O ₇ 1.1762 Dy ₂ O ₃ 1.1477 Ho ₂ O ₃ 1.1455 Er ₂ O ₃ 1.1435 Tm ₂ O ₃ 1.1421 Yb ₂ O ₃ 1.1387 Lu ₂ O ₃ 1.1371 Y ₂ O ₃ 1.2699
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. 	No Mineral Resource estimate is being reported in this announcement. A handheld Garmin 64S GPS was used to record the rockchip sample locations in in UTM grid Zone 38 South. No topography dtm's have been generated/obtained at this stage. The location of data points using a handheld GPS is considered adequate for this stage of work.
Data spacing and distribution	 Data spacing for reporting of Exploration Results. Whether the data spacing and distribution is sufficient to establish the degree of geological and grade continuity 	Rock chip samples have been collected from outcrops, which occur at irregular spacings. No Mineral Resources or Ore Reserves are being declared.



Criteria	JORC Code explanation	Commentary
	 appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied. Whether sample compositing has been applied. 	Rockchip samples were combined as a single sample for the ANSTO analysis.
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. 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. 	Rockchip samples were collected from outcrops containing rare earth mineralisation (based on field observations) and is therefore biased sampling. No drilling has taken place.
Sample security	The measures taken to ensure sample security.	The sample was transported from site to the capital (Antananarivo) by vehicle, by air from Antananarivo to Perth and by air from Perth to ANSTO in Sydney.
Audits or reviews	The results of any audits or reviews of sampling techniques and data.	No audits or reviews have been undertaken.

Section 2 Reporting of Exploration Results

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 licence to operate in the area. 	The Ambato Project area is covered by 2 exploration permits (10868 and 12013). There are no joint ventures, royalties, national parks, or any known native title interests, historical sites or environmental concerns associated with the tenements or tenement areas. There is currently a moratorium over all permit approvals/ renewals in Madagascar, and as such the PR's held by MMI have expired and are awaiting renewal. Annual administration fees (FA) have not been paid since 2012, meaning FA's are outstanding for 2013 to the present. It is understood that the Bureau de Cadastre Minier de Madagascar (BCMM) will not grant any permit renewals prior to the 2018 Madagascar election, which is scheduled to be held in October or



Criteria	JORC Code explanation	Commentary
		November 2018.
Exploration done by other parties	Acknowledgment and appraisal of exploration by other parties.	The Ambato project area has been subject to a number of studies by various groups (see Appendix 4 in ASX announcement dated 29 th March 2018 for a summary of known exploration activities undertaken across the Ambato area). Exploration undertaken includes geological observations, geological mapping, stream sediment sampling, trenching, pitting, channel sampling, and radiometric surveying.
Geology	Deposit type, geological setting and style of mineralisation.	The Ambato Project is located within the Proterozoic Itremo Group which consists of quartzites, dolomitic marbles, and micaceous schists intruded by rocks of the Neoproterocoiz Imorona-Itsindro and Ambalavao Suites including; calc-alkaline granites (+microcline+oligoclase), syenites, gabbros, norites, and alkaline granites (+microcline). Deformation in the Itremo Group sediments is interpreted to consist of two phases - an early phase of nappe-forming layer-parallel deformation resulted in the development of regional scale layer-parallel folds, and a second phase that produced the dominant north trending structural grain observed in the Itremo Group.
		Granite and syenite intrusions of the Neoproterocoiz Imorona-Itsindro and Ambalavao Suites were emplaced between 570 and 520 MA, and are generally controlled by NNW-SSE trending faults. Rare earth element mineralisation is associated with the emplacement of the granite and syenite intrusions. REE mineralisation occurs as bastnaesite, ± monazite, and ± chevkinite, found in structures, quartz ± carbonate veins, ubiquitous distribution within altered syenites, and possibly as stockwork mineralisation. Some interpretations have proposed that REE mineralisation at Ambato is part of a larger carbonatite system even though carbonatites have not been previously identified at Ambato. The Ambato Project consists of seven (7) prospects;
		within altered syenites, and possibly as stockwork mineralisation. Some interpretations have propo that REE mineralisation at Ambato is part of a large carbonatite system even though carbonatites have not been previously identified at Ambato.



Criteria	JORC Code explanation	Commentary
		Lesada, Vohiniariana, and Sambalahy.
Drill hole Information	 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: easting and northing of the drill hole collar elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar dip and azimuth of the hole down hole length and interception depth hole length. 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. 	Not applicable.
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. 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. The assumptions used for any reporting of metal equivalent values should be clearly stated. 	No averaging techniques have been applied to the reporting of exploration results. Metal equivalents have not been used. Rare earth grades have been reported in this announcement as TREE (Total Rare Earth Element) and TREO% (Total Rare Earth Oxides). TREE is defined as La + Ce + Pr + Nd + Sm + Eu + Gd + Tb + Dy + Ho + Er + Tm + Yb + Lu TREO is defined as La ₂ O ₃ + CeO ₂ + Pr ₆ O ₁₁ + Nd ₂ O ₃ + Sm ₂ O ₃ + Eu ₂ O ₃ + Gd ₂ O ₃ + Tb ₄ O ₇ + Dy ₂ O ₃ + Ho ₂ O ₃ + Er ₂ O ₃ + Tm ₂ O ₃ + Yb ₂ O ₃ + Lu ₂ O ₃ .
Relationship between mineralisation widths and intercept lengths	 These relationships are particularly important in the reporting of Exploration Results. If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported. 	Rockchip sample results represent point values only (i.e. no widths are being reported or assumed). Until further work is undertaken, the width of mineralisation is not known.



Criteria	JORC Code explanation	Commentary
	If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (eg 'down hole length, true width not known').	
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 sectional views.	Please refer Appendix 2 of ASX announcement dated 29 th March 2018 for relevant figures.
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.	All known analytical assay results have been reported in Appendix 1 of ASX announcement dated 29th March 2018.
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.	All known other exploration activities have been summarised in ASX announcement dated 29 th March 2018.
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. 	Minbos plans to undertaken the following exploration work: • Maiden drilling program of 600 to 1,000 m of diamond drilling at Ankazohambo. • Rock-chip sampling and mapping at the other prospect areas. • Metallurgical testwork.