8 May 2024 ASX Announcement

5N HPA Production Confirmed from 100kg Composite Sample

Australian High Purity Alumina (HPA), kaolin and silica exploration company Corella Resources Ltd (ASX:CR9) (**Corella** or the **Company**) is pleased to announce the successful confirmation of further 5N (99.999% purity) High Purity Alumina (HPA) production from a 100kg composite sample consolidated from the sonic core program obtained from across the Tampu deposit. This significant milestone marks a pivotal advancement in Corella's exploration and production efforts within the high-value HPA sector.

Key highlights of the announcement include:

- **Bulk Sample:** A 100kg composite sample from sonic core sourced from across the Tampu deposit was processed by Dalian University of Technology (DUT). This process aimed to optimize the HPA flowsheet and assess the range of feed grade versus HPA grade as well as temperature parameters.
- **Successful Production:** DUT achieved successful production of 5N HPA from Tampu kaolin utilizing an optimized flowsheet. This achievement underscores the technical proficiency and effectiveness of Corella's testing methodologies.
- **Independent Verification:** The purity of the produced 5N HPA was independently verified by leading independent laboratories Eurofins in the USA and using a commercial Ultra High Purity Alumina (UHPA) sample purchased on market.
- **Future Endeavours:** Corella reaffirms its commitment to advancing HPA production capabilities. With the intention to capitalize on these successes, the Company plans to construct a lab-scale pilot plant in Western Australia as an integral component of the HPA pre-feasibility study. This facility will focus on producing HPA from kaolin obtained through additional kaolin drilling and test/DSO pit extraction planned in 2024.

HPA Results Independently Verified

The successful production of 5N HPA from the optimised flowsheet at DUT (Figure 1) was independently verified by the leading global laboratory for HPA analysis, Eurofins located in the USA. A commercially available UHPA sample was also submitted as an internal company standard for assurance and comparison as lab analysis can vary dependant on analysis type, calibration standards and analytical methods. Full laboratory results as received are reported in Table 1 as well as total reporting of cations (and removal of anions) in alignment with commercially available 5N.

Figure 1: 5N HPA produced using optimised flowsheet from Tampu Kaolin

Table 1: Comparison table of HPA analysis between laboratories and using a commercial 5N sample

	Manufacturer analysis		Eurofins	
Company	**Corella**	**Commercial**	**Corella**	**Commercial**
Process	**High Temp**	**UHPA**	**High Temp**	**UHPA**
	Concentration	**Concentration**	**Concentration**	**Concentration**
	[ppm wt]	**[ppm wt]**	**[ppm wt]**	**[ppm wt]**
Ag			< 0.5	< 0.5
As			< 0.5	< 0.5
Au			Interference	Interference
B			0.26	0.14
Ba			< 0.1	< 0.1
Be			< 0.05	< 0.05
Bi			< 0.1	< 0.1
Br			< 0.5	< 0.5
Ca	1.2	0.2	< 0.5	1
Cd			< 0.5	< 0.5
Ce		0.2	< 0.1	< 0.1
Cl			3.2	5.3
Co			< 0.05	< 0.05
Cr		0.5	< 0.5	0.78
Cs			< 0.1	< 0.1
Cu			< 1	2.2
Dy			< 0.1	< 0.1
Er			< 0.1	< 0.1
Eu			< 0.1	< 0.1
F			< 5	< 5
Fe		1.8	< 1	1.7
Ga			< 0.1	0.49
Gd			< 0.1	< 0.1
Ge			< 1	< 1
Hf			< 0.5	< 0.5
Hg			< 0.5	< 0.5
Ho			< 0.1	< 0.1
I			< 0.1	< 0.1
In			< 0.5	< 0.5
Ir			< 0.05	< 0.05
K			< 0.5	< 0.5
La			< 0.1	< 0.1
Li			0.88	< 0.05
Lu			< 0.1	< 0.1
Mg	0.58		0.62	0.25
Mn			0.06	0.51
Mo			< 5	< 5
Na	5.05		1.6	0.57
Nb			< 10	< 10
Nd			< 0.1	< 0.1
Ni		0.3	< 0.5	< 0.5
Os			< 0.05	< 0.05
P	0.95		< 0.5	2.4
Pb			< 0.1	< 0.1
Pd			< 0.5	< 0.5
Pr			< 0.1	< 0.1
Pt			< 0.1	< 0.1
Rb			< 0.05	< 0.05
Re			< 0.5	< 0.5
Rh			< 0.5	< 0.5
Ru			< 0.5	< 0.5
S			< 0.5	5.2
Sb			< 0.1	< 0.1
Sc			< 0.05	< 0.05
Se			< 0.5	< 0.5
Si		0.6	3.7	0.98
Sm			< 0.1	< 0.1
Sn			< 0.5	< 0.5
Sr			< 0.05	< 0.05
Ta			Electrode	Electrode
Tb			< 0.1	< 0.1
Te			< 0.1	< 0.1
Th			< 0.05	< 0.05
Ti		0.2	0.29	0.28
Tl			< 0.1	< 0.1
Tm			< 0.1	< 0.1
U			< 0.05	< 0.05
V			0.18	0.16
W			< 5	< 5
Y			< 0.05	< 0.05
Yb			< 0.1	< 0.1
Zn	0.083	0.5	0.51	< 0.5
Zr			< 0.1	< 0.1

HPA (All elements)	**99.9992**	**99.9996**	**99.9989**	**99.9978**
HPA (excl Cl)	**99.9992**	**99.9996**	**99.9992**	**99.9983**
HPA (excl S & Cl)	**99.9992**	**99.9996**	**99.9992**	**99.9989**

Next steps

As previously announced, the HPA PFS is decoupled from the Tampu kaolin feasibility study as they are independent of one another. The kaolin feasibility and wash plant will produce the feedstock for the HPA processing plant. The next step in the HPA project will be to confirm a flowsheet for the cost of a pilot plant as a part of the HPA Pre-Feasibility Study costs.

Jess Maddren, CEO of Corella Resources Limited, commented: "The confirmation of 5N HPA production from our large composite sample represents a significant milestone for Corella. We are encouraged by the results achieved through our collaboration with Dalian University of Technology and the validation from independent laboratories. This success paves the way for further advancements as we progress towards establishing ourselves as a prominent player in the HPA market."

The Company looks forward to updating shareholders on further developments as it continues to pursue its strategic objectives in the high-purity alumina sector.

For further information, please contact:

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No New Information

Except where explicitly stated, this announcement contains references to prior exploration results and Mineral Resource estimate, all of which have been cross-referenced to previous market announcements made by the Company. The Company confirms that is not aware of any new information or data that materially affects the information included in the relevant market announcements and, in the case of the estimate of Mineral Resource, that all materials assumptions and technical parameters underpinning the results and/or estimate in the relevant market announcements continue to apply and have not materially changed.

Forward-Looking Statements

This document may contain certain forward-looking statements. Forward-looking statements include but are not limited to statements concerning Corella Resources Ltd.'s (Corella) current expectations, estimates and projections about the industry in which Corella operates, and beliefs and assumptions regarding Corella's future performance. When used in this document, the words such as "anticipate", "could", "plan", "estimate", "expects", "seeks", "intends", "may", "potential", "should", and similar expressions are forward-looking statements. Although Corella believes that its expectations reflected in these forward-looking statements are reasonable, such statements are subject to known and unknown risks, uncertainties, and other factors, some of which are beyond the control of Corella and no assurance can be given that actual results will be consistent with these forward-looking statements.

Competent Person Statement – Exploration and Geological results

The information in this announcement that relates to exploration and metallurgical results is based on information reviewed, collated, and fairly represented by Mr. Anthony Cormack who is a Member of the Australian Institute of Mining and Metallurgy and the Managing Director of Corella Resources. Mr. Cormack has sufficient experience relevant to the style of mineralisation and type of deposit under consideration, and to the activity which has been undertaken, to qualify as a Competent Person as defined in the 2012 Edition of the Joint Ore Reserves Committee (JORC) Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. Mr. Cormack consents to the inclusion in this report of the matters based on this information in the form and context in which it appears.

Competent Person Statement – Metallurgical results

The information in this announcement that relates to processing and metallurgy is based on information reviewed, collated, and fairly represented by Dr. Lin Zhou who is a Member of the Australian Institute of Mining and Metallurgy and a consultant metallurgist to Corella Resources. Dr. Zhou has sufficient experience relevant to the style of mineralisation and type of deposit under consideration, and to the activity which has been undertaken, to qualify as a Competent Person as defined in the 2012 Edition of the Joint Ore Reserves Committee (JORC) Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. Dr. Zhou consents to the inclusion in this report of the matters based on this information in the form and context in which it appears.

JORC Code, 2012 Edition – Table 1

Section 1 and Section 2 of Table 1

Section 1: Sampling Techniques and Data

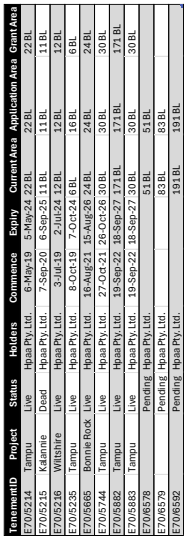
Criteria	JORC Code explanation	Commentary
Sampling techniques	*Nature and quality of sampling (e.g. cut channels, random chips, or specific specialised industry standard measurement tools appropriate to the minerals under investigation, such as downhole gamma sondes, or handheld XRF instruments, etc). These examples should not be taken as limiting the broad meaning of sampling.*	During September and October 2022 Corella completed 46 Resource Definition drillholes for a total of 879m consisting of 32 Sonic core and 14 Aircore drillholes. Bulk drill cuttings were obtained at 1-metre intervals. The entire 1-metre sample was taken for laboratory analysis. Non-kaolin samples based on a visual inspection by a qualified geologist were not sent for assay. The double bagged sonic drill core was sent to ALS Metallurgy Pty Ltd's laboratory in Balcatta, WA. For assay sample preparation, XRF analytical determination and metallurgical test work. SG analysis was conducted on the sonic drill core. Drilling and sampling activities were supervised by a suitably qualified company geologist who was always present at the drill rig. All 1-metre drill samples were geologically logged by the geologist at the drill site. Field duplicate splits were undertaken nominally every 20th sample for replicate analysis to quantify sampling and analytical error, as were standards and blanks for QAQC. Logged geological lithology information such as degree of weathering, chemical alteration, mineral percentage (kaolin content) sample colour under ambient conditions, and moisture content were used to determine bright white kaolin intervals for assay. Aircore drilling was used to obtain 1m samples from which a sub-sample off the rig mounted cyclone of approximately 3 kg was collected in labelled calico bags. Sonic core was doubled bagged directly from the rods and stacked on pallets for logging and transport. This was dispatched to a suitably qualified mineral processing analytical laboratory. The samples were then sorted, dried, and weighed. Samples have been laboratory sieved to collect -45µm material for analysis. The -45µm sample was split where necessary then pulverized to a pulp in a tungsten carbide bowl. All excess sample material (residue) was retained. The samples were cast using a 66:34 flux with 4% Lithium nitrate added to form a glass bead. Al2O3, BaO, CaO, Cr2O3, Fe2O3, K2O, MgO, MnO, Na2O, P2O5, SiO2, SO3, SrO, TiO2, V2O5, Zn, Zr were analytically determined by X-Ray Fluorescence Spectrometry on oven dry (1050C) samples. Loss on Ignition results were determined using a robotic TGA system. Furnaces in the system were set to 110 and 1000 degrees Celsius. LOI1000 has been determined by Robotic TGA. Moisture was determined by drying the sample at 105 degrees Celsius. Moisture was determined gravimetrically. These measurements have been determined using an analytical balance. Dry Weight, Screened Weight, Weight-45µm, Wet Weight have been determined gravimetrically. Yield was calculated from other components assayed.
	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 mineralization that are Material to the Public Report. *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 pulverized 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 mineralization types (e.g. submarine nodules) may warrant disclosure of detailed information.*	

Criteria	JORC Code explanation	Commentary
Drilling techniques	*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.).*	Sonic drilling was completed by Sonic Drilling in Perth WA by a Eijkelkamp track mounted rig with PQ size core standard tube. Core was unoriented and all core recovered was doubled bagged at the rig into 1m and 0.5m samples.
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.* *Relationship between sample recovery and grade/sample bias.*	Drill sample recovery was recorded in the field on paper log sheets with samples visually assessed for recoveries. Efficient and consistent drill operation was maintained by an experienced driller. Drill bits used were appropriate for the type of formation to maximise amount of drill cutting recovered. Drill bits were replaced where excessive wearing of the tungsten cutting teeth had occurred and inner tubes replaced when worn. Based on the sample drilling methods utilized and the relatively homogeneous nature of the sample material through visual inspection no correlation has been established between sample recovery and grade. No sample bias is indicated due to preferential loss or gain of fine/coarse materials as particle size is relatively consistent.
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.*	All individual 1-metre and 0.5-metre intervals were geologically logged, recording relevant data to a set template using company codes. Observations on lithology, colour, degree of weathering, moisture, mineralization, and alteration for sampled material were recorded. A small representative sample is collected for each 1-metre interval and placed appropriately. All logging includes lithological features and estimates of basic mineralogy. Logging is generally qualitative. 100% of the downhole drill samples were geologically logged from surface to EOH.
Subsampling 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 subsampling 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.*	Sonic drilling was completed by Sonic Drilling in Perth WA by a Eijkelkamp track mounted rig with PQ size core standard tube. Core was unoriented and all core recovered was doubled bagged at the rig into 1m and 0.5m samples. The sample size is considered appropriate for the fine grain size of the kaolin clay material sampled. ALS Metallurgy were engaged for the sonic drill core samples. The samples were sorted, dried, and weighed. Each sample was homogenized via a rotary sample divider and a 300 g representative sub-sample was split for wet sieving at 45µm and assays.
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.*	ALS Metallurgy was engaged for the sonic drill core samples. The samples were sorted, dried, and weighed. Samples were wet sieved to collect -45µm material for analysis. The -45µm sample was split where necessary then pulverized to a pulp in a tungsten carbide bowl. All excess sample material (residue) was retained. The samples were cast using a 66:34 flux with 4% Lithium nitrate added to form a glass bead. Al2O3, BaO, CaO, Cr2O3, Fe2O3, K2O, MgO, MnO, Na2O, P2O5, SiO2, SO3, SrO, TiO2, V2O5, Zn, Zr were analytically

Criteria	JORC Code explanation	Commentary
	Nature of quality control procedures adopted and whether acceptable levels of accuracy (i.e. lack of bias) and precision have been established.	determined by X-Ray Fluorescence Spectrometry on oven dry (1050C) samples. Loss on Ignition results have been determined using a robotic TGA system. Furnaces in the system were set to 110 and 1000 degrees Celsius. LOI1000 have been determined by Robotic TGA. Moisture has been determined by drying the sample at 105 degrees Celsius. Moisture have been determined Gravimetrically. These measurements have been determined using an analytical balance Dry Weight, Screened Weight, Weight - 45µm, Wet Weight have been determined Gravimetrically. Yield have been calculated from other components assayed. The assaying and laboratory procedures used are appropriate for the style of 7mineralization targeted. The technique is considered total. Acceptable levels of accuracy and precision have been established. No handheld methods are used for quantitative determination. Quality control procedures (QAQC) adopted was by utilising duplicates, blanks and standards every 20m. Bureau Veritas used internal XRF standards and duplicates. The overall quality of QAQC is considered to be good. Acceptable levels of accuracy (i.e. lack of bias) and precision have been established.
Verification of sampling and assaying	*The verification of significant intersections by either independent or alternative company personnel.*	Significant mineralisation intersections were verified by qualified, alternative company personnel. All data was collected initially on paper logging sheets and codified to the Company's templates. This data was hand entered to spreadsheets and validated by Company geologists. This data was then imported to a Microsoft Access Database then validated automatically and manually. No adjustments have been made to assay data.
	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.	
Location of data points	*Accuracy and quality of surveys used to locate drillholes (collar and downhole surveys), trenches, mine workings and other locations used in Mineral Resource estimation.*	A hand-held Garmin GPS was used to set out drill hole locations. Drill hole collars were subsequently located by Differential 3D GPS. Expected accuracy is +/- 0.25m for northing, easting, and RL height. UTM projection MGA94 Zone 50 with GDA94 datum is used as the cartesian coordinate grid system. Topographic Control is from DTM and Differential 3D GPS. Accuracy +/- 0.25m DGPS pickups are considered to be adequate topographic control measures for this early stage of drilling.
	Specification of the grid system used.	
	Quality and adequacy of topographic control.	
Data spacing and distribution	*Data spacing for reporting of Exploration Results.*	All drilling was undertaken predominantly on 160m or 80m (infill) spacings on 160m spaced, east-west orientated drill traverse lines.
	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.	
	Sample compositing.	
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.*	No bias attributable to orientation of sampling has been identified. All drilling is vertical and is targeting a generally flat lying kaolinite weathering profile, comprising zones of horizontal and sub-horizontal kaolin and saprolite. As a result, drilling orientations are considered appropriate with no obvious bias.
	If the relationship between the drilling orientation and the orientation of key mineralized structures is	

Criteria	JORC Code explanation	Commentary
	considered to have introduced a sampling bias, this should be assessed and reported if material.	All holes were drilled vertically as the nature of the mineralisation is horizontal. No bias attributable to orientation of drilling has been identified.
Sample Security	*The measures taken to ensure sample security.*	The chain of custody was managed by Corella Resources. All drill samples and sub-samples were stored on site while the drilling was being conducted, before being transported for analysis. The 100kg composite sample was prepared by ALS Metallurgy in Perth and collected by company personnel, under Corella supervision. The remaining representative field samples are stored at a secure storage facility in Perth.
Audits or reviews	*The results of any audits or reviews of sampling techniques and data.*	No independent 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 license to operate in the area.*	The Company holds 100% of the following tenements and tenement applications.  The tenements are in good standing and no known impediments to exploration or mining exist.
Exploration done by other parties	*Acknowledgment and appraisal of exploration by other parties.*	The Tampu kaolin deposit was discovered by Whitsed Resources ("Whitsed") in early 1991. Whitsed conducted an air core (AC) drilling and metallurgical test-work. Details of the early Whitsed historical drilling, sampling and assaying techniques are limited. All of the Whitsed work is summarized in the body of this report.
Geology	*Deposit type, geological setting and style of mineralisation.*	The project is dominated by lateritised granitic basement of the Murchison Terrane covered by Tertiary aeolian and alluvial/colluvial sediments. The basement has been intruded by dolerite dykes and quartz veins. Tampu is a residual kaolin deposit formed in situ through the kaolinisation of a feldspar-rich granitoid by weathering. The overlying regolith profile includes colluvial sand, clay and gravel, nodular and pisolitic lateritic nodules and hard silcrete horizons of varying thickness over saprolitic kaolinised weathered granitoid rocks.

Criteria	JORC Code explanation	Commentary
		Continuity of kaolin grade at the project is controlled by the depth and completeness of weathering over the primary granitoid.
Drillhole information	*A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drillholes:* • *easting and northing of the drillhole collar* • *elevation or RL (Reduced Level – elevation above sea level in metres) of the drillhole collar* • *dip and azimuth of the hole* • *downhole length and interception depth* • *hole length.*	All holes were drilled vertically.
	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.	
Data aggregation methods	*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.*	Cut-off grades: no maximum or minimum grade truncations (cutting of high and low grades) was performed. Only a contiguous (inclusive) aggregated summary of the most outstanding results were selected i.e. "significant intercepts". Cut-offs are difficult to apply due to the multi-variate assay nature of the mineralized zone in any event. Not applicable as no aggregation incorporating short lengths of high-grade results and longer lengths of low-grade results has been undertaken on the assay results. Not applicable as metal equivalent values are not used.
	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.	
Relationship between mineralisation widths and intercept lengths	*These relationships are particularly important in the reporting of Exploration Results.*	It is considered that the mineralisation lies in laterally extensive, near surface, flat "blanket" style. Mineralisation is generally horizontal, and drill holes perpendicular (90 degrees oblique) to the intercepted kaolin mineralisation. Downhole widths approximate true widths. Some mineralisation currently remains open at depth.
	If the geometry of the mineralisation with respect to the drillhole angle is known, its nature should be reported.	
	If it is not known and only the downhole lengths are reported, there should be a clear statement to this effect (e.g. 'downhole 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 drillhole collar locations and appropriate sectional views.*	Refer to the appropriate figures and tabulations of significant intercepts in the body of this report.
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.*	Exploration results are not being reported.
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;*	No other substantive exploration data is available.

Criteria	JORC Code explanation	Commentary
	metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances.	
Further work	*The nature and scale of planned further work (e.g. tests for lateral extensions or depth extensions or large-scale step-out drilling).*	The Company plans to complete further HPA specific metallurgical and development work at the Tampu Kaolin Project as a part of the Pre-Feasibility Study for HPA.
	Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.	