ASX Announcement
14 February 2017

VANGO RELEASES HIGHLY POSITIVE DFS UPGRADE

Gold exploration and development company Vango Mining Limited (ASX: VAN) (Vango, the Company) is pleased to announce positive results from a recently completed upgraded Definitive Feasibility Study (DFS) on its K2 Deposit within the wider 100%-owned Plutonic Dome Gold Project, in the Mid West region of Western Australia.

The upgraded DFS updates commodity prices and exchange rates from a previous DFS update (ASX announcement 8 October 2014) to current values, as at February 2017, as well as mining costs. The original DFS was released 1 July 2014.

All other components of the DFS remain unchanged from the previous DFS update of October 2014. This DFS upgrade is intended to be read in conjunction with the 2014 DFS and 2014 DFS Update.

Highlights

The results of the upgraded DFS are highly positive, and further strengthen the economic robustness of the K2 Deposit. Headline results include;

- The Project's pre-tax NPV has increased to $19.02 million from $14.87 million in the previous DFS update of October 2014;
- Project's IRR is 382.07%, up from 229% in the October 2014 DFS update;
- Pre-production Capital costs are estimated at $6.4 million;
- All-In Sustaining Unit Cost of Production indicates a project margin of approximately $462/oz;
- The Project will generate total free cashflows of $22.66 million over an initial two year mine life, compared to $18.22 million in the October 2014 DFS update; and
- Project margin of approximately $462 per ounce and Payback period is just 13 months.

Total mined tonnes of 245,214t and head grade of 6.91 g/t gold remain unchanged, and the upgraded DFS does not contemplate additional potential Resources that may be delineated in Vango's 2017 drilling programs. **Details of the outcomes of the upgraded DFS are included in this announcement.**

DFS Background

The K2 DFS assessed the economic viability of underground mining methods to extract ore from the K2 Deposit with toll treatment of ore at the nearby Plutonic Processing Plant, which is owned by Billabong Gold Pty Ltd (Billabong). Vango has a binding Ore Treatment Agreement with Billabong to facilitate the processing of ore from K2 (ASX announcement 24 September 2014).

The DFS, DFS 2014 update and this upgraded DFS were undertaken by leading engineering and services group, Entech Pty Ltd (Entech), with input from various industry consultants.

The DFS has been evaluated at project level and does not consider ownership structures between Vango and external parties. All currency values are in Australian dollars unless specified otherwise.

About the K2 Deposit

The K2 Deposit is part of Vango's 100%-owned Plutonic Dome Gold Project, which covers an area of 412 km^2. K2 is located in the north-eastern extent of the Project, approximately 35km by haul road from Billabong's Plutonic Gold Mine Treatment Plant, in the southwest region of M52/183.

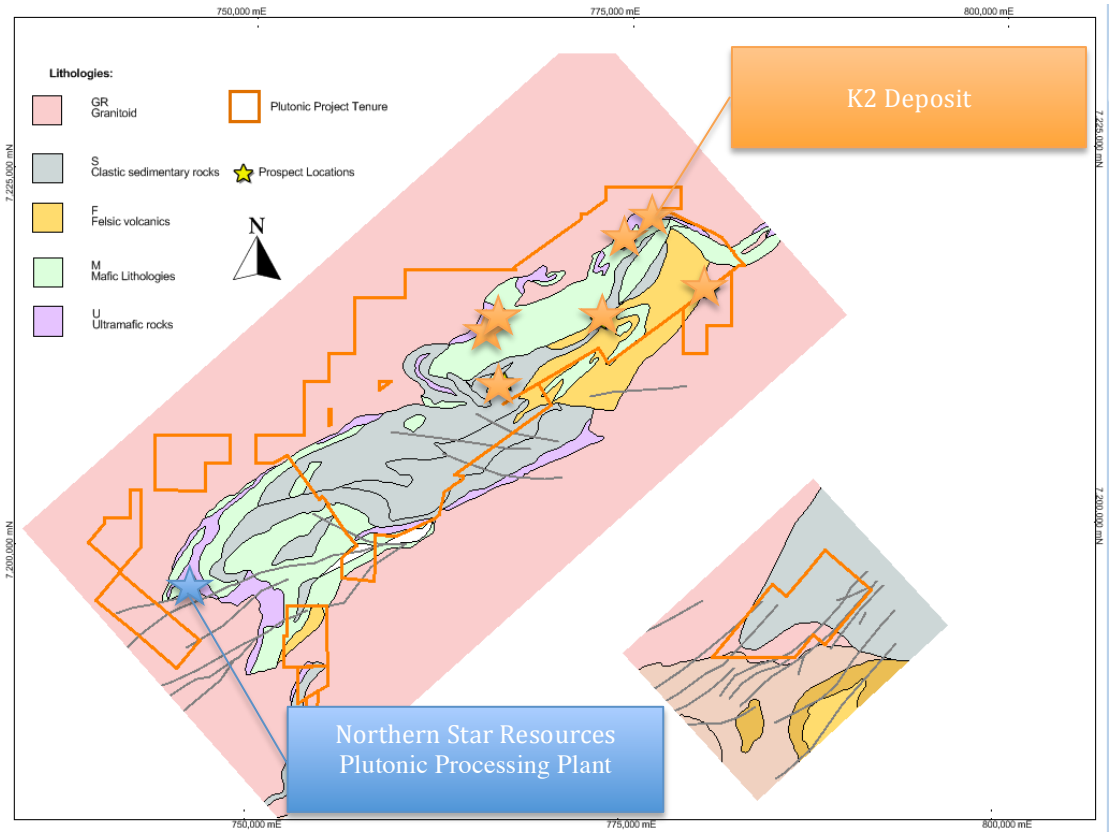

Figure 1: Project Location Plan

The K2 Deposit was last mined in 1997 by Resolute Mining who had completed an underground development Feasibility Study in 1996. Resolute excavated a boxcut and established the decline to access underground drill positions before the mine was prematurely closed in 1998 after only minor amounts of ore extraction.

Vango and Dampier Gold Limited (ASX: DAU) (Dampier) have a Heads of Agreement for the funding and profit share arrangements over the future proposed production and extraction of gold from the K2 Deposit (ASX announcement, 16 December 2016).

K2 Development Plan

Based on the positive outcomes of the upgraded DFS, Vango will now expedite its plans to bring the K2 Deposit into production in the near term, pursuant to its agreement with Dampier. It then plans to utilise the free cashflows generated to expand Resources at the Trident Deposit within the Plutonic Dome Project with a view to developing Trident into a long term gold producing project.

At K2, the Company also plans to expand the Resource base, and the potential mine life of the proposed mining operation, by targeted drilling programs designed to delineate additional Resources. These are anticipated to be conducted in H1, 2017 and further details of these programs will be provided in due course.

Upgraded DFS Outcomes

Financial and Production Highlights:

Table 1: K2 Financial Summary of Project Returns

Project Returns	
NPV @ 8%	$ 19,022,205
NPV @ 10%	$ 18,238,737
IRR	382.07%
Payback Years	1.1
Free Cashflow	$ 22,662,013
C1 Cash Costs / oz	$ 907/ oz
All in Sustaining Costs	$ 1,117/ oz
C1 Cash Costs / t	$ 181/ t
All in Sustaining Costs	$ 223/ t
Mined Tonnes	245,214 t
Head Grade	6.91 g/t

Notes:
Gold Metallurgical Recovery 90%
WA State Royalty 2.5%
Northern Star Royalty 1%
Mining Recovery for stopes 90%
Mining Recovery Crown Pillar 80%

Total Resources includes Inferred Mineral Resources. See Table 6 - Total Resources.

There is a low level of geological confidence associated with inferred mineral resources and there is no certainty that further exploration work will result in the determination of indicated mineral resources or that the production target itself will be realised.

Table 2: K2 Cash Flow Summary

		Y1	Y2	Total
Revenue				
Gold Price	$	$1,579	$1,579	
Spot Revenue	$	$17,026,580	$60,360,096	$77,386,675
Royalty (Government)	$	$425,664	$1,509,002	$1,934,667
Total Project Revenue	*$*	*$16,600,915*	*$58,851,093*	*$75,452,008*
Costs				
Mining	$	$12,622,927	$18,505,840	$31,128,767
Processing	$	$3,250,838	$8,569,695	$11,820,533
General & Administration	$	$764,907	$730,764	$1,495,670
Capital Expenditure	$	$5,893,650	$2,451,375	$8,345,025
Total Project Costs	*$*	*$22,532,322*	*$30,257,673*	*$52,789,995*
Project Cash Flow Before Tax	**US$**	**-$5,931,407**	**$28,593,420**	**$22,662,013**
Cumulative Cash Flow	*US$*	*-$5,931,407*	*$22,662,013*	

Table 3: K2 Operating Costs

		Y1	Y2	Total
Mining Costs (Ore and Waste)	$/oz	$1,170.58	$484.09	$635.13
Processing Costs	$/oz	$301	$224	$241
Administration	$/oz	$71	$19	$31
C1 Cash Costs	**$/oz**	**$1,543**	**$727**	**$907**
Capital Costs	$/oz	$547	$64	$170
C2 Cash Costs	**$/oz**	**$2,090**	**$792**	**$1,077**
Royalties	$/oz	$39	$39	$39
Corporate Costs	$/oz	$0	$0	$0
C3 Cash Costs	**$/oz**	**$2,129**	**$831**	**$1,117**
Sustaining Capex	$/oz	$0	$0	$0
All in Sustaining Costs	**$/oz**	**$2,129**	**$831**	**$1,117**

Table 4: Commodity Price Assumptions and Comparison

Value	Current Assumptions	2014 DFS Update	2014 DFS
Gold Price US$	US$1,200/oz.	US$ 1,220/oz.	US$ 1,300/oz.
Exchange Rate (US$:AU$)	0.76	0.87	0.93
Gold Price AU$	$1,579	$1,402	$1,398

Note: *The figures used in this update are based on the spot gold price and exchange rate as of 31st January 2017.*

Mining Costs:

The upgraded DFS has assessed mining costs from a mining contractor tender process which was carried out in October 2014, subsequent to the previous October 2014 DFS Update.

Three suitably experienced and reputable underground mining contractors took part in the tender process, and as a result of the process, an underground contractor was engaged as Vango's Preferred Tenderer (see Table 5 and Figure 2).

Table 5: K2 Mining Costs Summary

Cost Category	Unit Rate	Y1	Y2	Total
Capital Lateral ($M)	$29.18 /t ore	5.13	2.02	**7.16**
Operating Lateral ($M)	$39.17 /t ore	3.47	6.13	**9.61**
Capital Vertical ($M)	$1.61 /t ore	0.07	0.33	**0.39**
Stoping ($M)	$18.07 /t ore	0.84	3.59	**4.43**
Mine Services ($M)	$61.17 /t ore	7.52	7.48	**15.00**
Mine Overheads ($M)	$8.53 /t ore	0.80	1.30	**2.09**
Surface Haulage ($M)	$10.20 /t ore	0.74	1.76	**2.50**
Infrastructure Capital ($M)	$9.31 /t ore	1.91	0.37	**2.28**
Total Mining Cost ($M)	*$177.26 /t ore*	*20.48*	*22.98*	***43.47***

Note: *As of February 2017 the final mining contract has not been signed and as such any costs referred to in this document are not yet binding.*

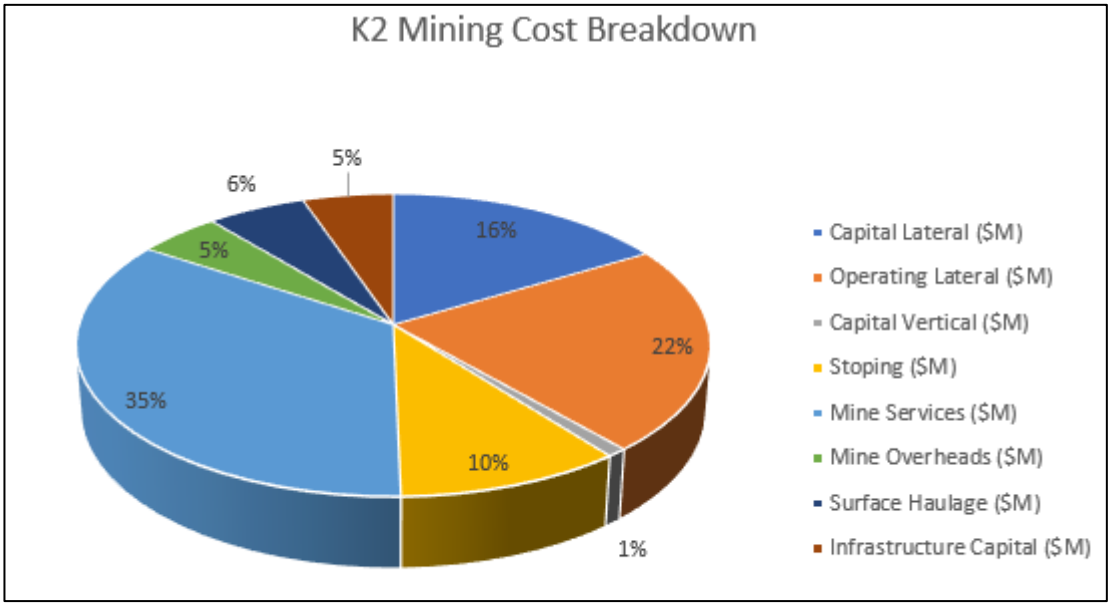

Figure 2: K2 Total Mining Costs Breakdown

Mining:

The proposed underground mine will be accessed via the existing boxcut, portal and decline development. This existing development will require some minor rehabilitation. It is proposed that a mining contractor will be used to extract and deliver ore to Northern Star Resources' Plutonic Processing Plant. Underground trucks will deliver ore to a specified location where a surface haulage contractor will transport this material from the mine to the Plutonic plant.

The mine design includes rehabilitation of approximately 840m of the existing decline before extending the decline and strike drive level arrangement. The decline is designed with a minimum standoff of 30 metres from the main ore zone. Levels are designed at 20m level spacing (floor to floor) implying that the stopes will be approximately 16m in height over a strike length of 37.5m.

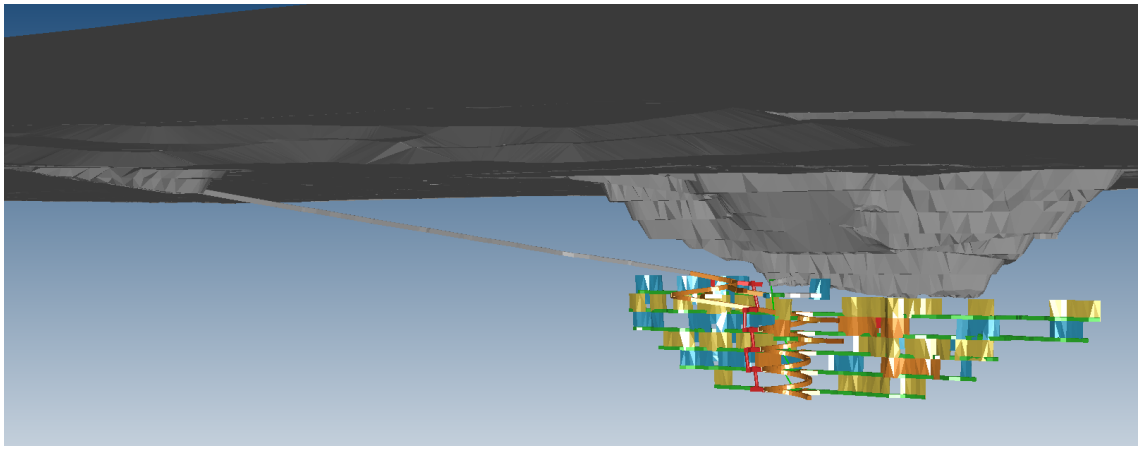

Figure 3: Planned Mine Development K2 Underground

The selected mining method of longitudinal open stoping with pillars has been determined to be the optimal method for the style of mineralisation and geotechnical parameters. The mining environment at K2 has been described as being relatively benign given the good rock mass conditions and shallow depths.

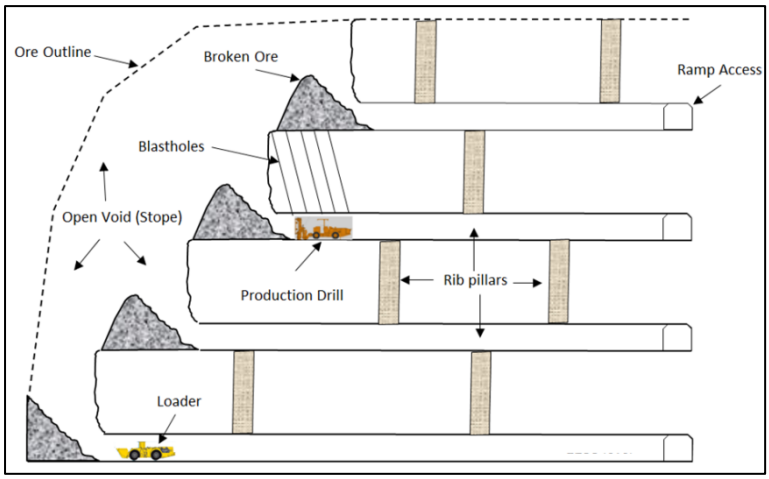

Figure 4: Longitudinal Longhole Stoping Schematic

Metallurgy & Processing:

Metallurgical test work completed concluded that K2 ore is amenable to conventional processing methods and can be expected to yield metal recoveries in excess of 90%. A metal recovery factor of 90% was adopted for the project, representing a value just below the lower end of the range reported in metallurgical test work.

The Plutonic Processing Plant is located 36km from K2 via existing Haul Roads. The ore processing schedule is based upon delivered ore being processed when made available to Northern Star Resources' Plutonic Processing Plant. Processing costs is all inclusive from the point of delivery.

Site Infrastructure and Services:

Electrical power will be provided to site by a BOO (Build, Own, Operate) power station located on the surface consisting of two 500kVa diesel generators producing power at 415V. The site based infrastructure will be located adjacent to the box cut and includes a ROM pad, waste dump, workshops, fuel storage and site based buildings, communications infrastructure and explosives storage facility.

Mineral Resource Estimation:

The Mineral Resource estimates were compiled by Geonomics Australia Pty Ltd (Geonomics) and are in accordance with JORC 2012 (Edition) Guidelines (ASX Release, *Resource Upgrade at Plutonic Dome Project* 01/10/2014). K2 contains a total mineral resource of 415,000t at 7.7g/t for 103,000oz Au at a 3g/t Au cut-off grade.

Table 6: K2 Mineral Resource Estimation

K2 Mineral Resource Estimation			
Category	**Tonnes**	**Au (g/t)**	**Contained Gold (oz)**
Indicated	198,000	8.9	57,000
Inferred	217,000	6.7	47,000
Total	**415,000**	**7.7**	**103,000**

Note: *Figures are rounded to nearest 1,000t, 0.1g/t Au and 1,000oz Au. Rounding errors may occur*

There is a low level of geological confidence associated with inferred mineral resources and there is no certainty that further exploration work will result in the determination of indicated mineral resources or that the production target itself will be realised.

Ore Reserve Estimation:

Table 7: Ore Reserve Estimation

K2 Underground Ore Reserve			
Reserve Category	**Tonnes**	**Au (g/t)**	**Contained Gold (oz)**
Proven	0	-	-
Probable	150,000	7.0	34,000
Total	**150,000**	**7.0**	**34,000**

Note: *The Indicated Mineral Resources are inclusive of those Mineral Resources modified to produce the Ore Reserve. Figures are rounded to nearest 1,000t, 0.1g/t Au and 1,000oz Au. Rounding errors may occur.*

An Ore Reserve estimate was conducted based on the Mineral Resource estimation conducted by Geonomics. The Ore Reserves have been estimated by Entech and is similarly in accordance with JORC 2012 (Edition) Guidelines. The Mineral Resources are reported inclusive of Ore Reserves. The estimation was conducted based upon the information derived from the Definitive Feasibility Study estimation conducted at K2. Cut off grades were determined based on unit costs from the feasibility level mining cost model.

Ore Reserves were calculated by generating detailed mining shapes for each stoping block as well as development. The designed stope shapes included planned dilution, being waste material that was located within the mineable stope shape. A 10% unplanned mining dilution factor was applied and is considered to be appropriate given the ground conditions and proposed style of mining. 95% mining recovery was applied post geological interpretation to generate the final diluted and recovered Ore Reserve estimate. No Inferred Mineral Resources were included in the Ore Reserve Estimation.

Infrastructure required for the proposed underground operation has been accounted for and included in all work leading to the generation of the Ore Reserve Estimation. An 8% discount rate was applied to the project and the NPV of the project is positive at the assumed commodity price and exchange rate.

The financial parameters quoted are based on total Resources included in the DFS. A detailed mine design and economic evaluation was used to generate the Ore Reserve and total Resources, which is completely sourced from underground mining.

The total Resources contains some Inferred Mineral Resources. These are immediately adjacent to, and/or below mined Ore Reserves. They have had the same modifying factors applied as per the Probable Ore Reserve. Vango believes that it is reasonable to expect a proportion of Inferred Resources to be upgraded when ore development and grade control occur in these areas.

Ore Reserves and total Resources are based on the K2 Mineral Resource reported in ASX announcement of 1 October 2014. No material change has occurred since reporting and Mineral Resources are inclusive of Ore Reserves.

Table 8: Total Resources

K2 Total Resources	Tonnes	Au (g/t)	Oz Au	Proportion
Indicated Resource	151,000	7.4	36,000	67%
Inferred Resource	94,000	6.0	18,000	33%
Total Resources	245,000	6.9	54,000	100%

Note: *Figures are rounded to nearest 1,000t, 0.1g/t Au and 1,000oz Au. Rounding errors may occur.*

Geotechnical:

Ground Control Engineering Pty Ltd (GCE) has conducted a feasibility geotechnical assessment of the mine design and production strategy for the Vango Mining K2 Deposit. The design and production strategy was provided by Entech.

The geotechnical assessment completed by GCE is based on core logging data from seventeen previously drilled geotechnical holes. The holes were originally drilled and logged by Resolute in 1995-1996. GCE completed a site visit in April 2014 to review and validate the historic geotechnical logging, based on inspection of existing core from the drill holes available on site. Additionally the K2 decline was inspected to determine the amount of rehabilitation required.

Permitting:

The works approval and mining proposal has been approved for dewatering of the K2 Open Pit and Underground. The water abstraction licence is due to be granted in the current quarter. The Mining Proposal with respect to the underground mining operation of K2 has also been approved.

Agreements:

The K2 Deposit is subject to various royalty and other agreements with third parties including the following:

- Payment to the Western Australian State Government of 2.5% for gold production above

$450/oz Au (1.25% for below $450/oz Au); and

- 1% NSR payable to Billabong.
- Legally binding toll treatment agreement with Billabong for the processing of Vango's ore from K2.

Vango has entered into a binding ore treatment agreement with Billabong, facilitating the processing of ore from K2 at Billabong's Plutonic Processing Facility which is located 36km from the K2 Deposit. Access to Billabong's Plutonic Processing Facility is via established haul roads. Billabong will be paid for the processing services through the provision of gold at the point of refining. This structure will assist greatly with the management of cash flow for Vango.

ENDS

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Competent person's statement:

The information in this announcement that relates to Mineral Resources for K2 and Plutonic Dome Project Exploration Results is based on information compiled and fairly represented by Mr Jonathan King, consultant geologist, who is a Member of the Australian Institute of Geoscientists and employed by Geonomics Australia Pty Ltd. Mr King has sufficient experience relevant to the style of mineralisation and type of deposit under consideration, and to the activity which he has 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 King consents to the inclusion in this report of the matters based on this information in the form and context in which it appears.

Information in this announcement that relates to the Ore Reserves has been compiled by Shane McLeay Principal Engineer – Entech Pty Ltd, who has sufficient experience 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 Joint Ore Reserves Committee (JORC) Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. Mr McLeay is a Fellow of the Australasian Institute of Mining and Metallurgy and consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

JORC Code, 2012 Edition- Table 1
Section 1, Sampling Techniques and Data

(Criteria in this section applies to all succeeding sections)

Criteria	JORC Code explanation	Comments
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.*	Samples were taken from Diamond Core and RC/RAB chips, with drilling predominantly angled at -60° towards 90° (Local grid, 142° MGA azimuth). Drill spacing was on a nominal 15x10m grid for RC and Diamond in the indicated portion of the resource to 40x40m spacing in the inferred material at depth. A total of 1961 RAB, RC and Diamond holes are included in the database for a total of 115,487m drilling.
	• *Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.*	Diamond drill holes were surveyed via down hole cameras at intervals of 30 to 50m during drilling using an Eastman Single Shot Camera. A number of holes were also surveyed by Sutron after drilling had finished using either a gyro or DEMS tool. RC Holes were surveyed via a Single Shot Eastman Camera at 30 to 50m. Deeper RC holes were surveyed down the hole by Sutron on completion of drilling.
	• *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.*	Diamond drilling was completed using truck mounted rigs under contract by Northwest Drilling using mainly NQ2 rods. Core was halved using a diamond core saw, and collected generally at one metre intervals for analysis, using geological/mineral boundaries as main sample interval boundaries. Samples were assayed for gold and arsenic at Amdel Laboratory (Perth): gold analysis was conducted using a 50g charge fire assay with AAS finish (detection limit of 0.01ppm Au) RC Drilling was completed under contract by Drillcorp using mainly Schramm rigs. RC holes were drilled using a 5.5in face sampling bit and samples were collected through a cyclone and riffle splitter both mounted on a sample trailer, at one metre intervals. Sampling of individual metres was done using a one eighth riffle box splitter (the smaller split being collected in calico bags for assaying). As with diamond core, samples were assayed for old and arsenic at Amdel using a 50g charge fire assay with AAS finish. Pre-collar material was collected using PVC bags at one metre intervals, and four metre composite scoop sampling was then undertaken

Criteria	JORC Code explanation	Comments
		RAB drilling was conducted under contract by Connector Drilling, with material laid out on the ground in one metre intervals and four metre composite spear samples subsequently collected for assaying. Bottom of hole samples were taken on a 2m interval. All composite samples were assayed for low level gold to 1ppb detection limit at Genalysis Laboratories in Perth using a B/ETA technique (50 digest, solvent extraction, graphite furnace AAS finish). Samples that returned greater than 0.1g/t Au were re-sampled on one metre intervals at a later date and submitted for low level gold analysis.
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).*	All drilling reported in this announcement is a combination of RAB, RC and Diamond Drilling undertaken by previous operators of the project. As such specific information relating to all drilling techniques (hammer sizes etc.) has not been accurately preserved.
Drill sample recovery	• *Method of recording and assessing core and chip sample recoveries and results assessed.*	As drilling was undertaken by previous project operators- no record of sample recoveries were located in exploration reports or on the original logs during the validation process
	• *Measures taken to maximise sample recovery and ensure representative nature of the samples.*	Diamond drill core was halved using a diamond core saw, and collected generally at one metre intervals for analysis, using geological/mineral boundaries as main sample interval boundaries. RC holes were drilled using a 5.5in face sampling bit and samples were collected through a cyclone and riffle splitter both mounted on a sample trailer, at one metre intervals. Sampling of individual metres was done using a one eighth riffle box splitter (the smaller split being collected in calico bags for assaying). RAB drilling was conducted under contract by Connector Drilling, with material laid out on the ground in one metre intervals and four metre composite spear samples subsequently collected for assaying. Bottom of hole samples were taken on a 2m interval.
	• *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.*	As drilling was undertaken by previous project operators- no further analysis is able to be undertaken. Further drilling activities to be conducted by Vango will involve the use of both diamond and RC drilling in order to understand potential issues relating to sample recovery and sample bias.
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.*	All RC and diamond drill holes have been logged in detail: lithology, hardness, alteration, mineralisation, colour, foliation, sulphides, grain size, weathering, texture and Quartz percentage
	• *Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.*	Logging has been conducted both qualitatively or quantitatively with full descriptions of lithologies, alteration and mineralisation comments noted as well as percentages estimates on veining, weathering, quartz and numeric scale of hardness
	• *The total length and percentage of the relevant intersections logged.*	The entire length of all RC and Diamond drill holes have been logged in full
Sub-sampling techniques and sample	• *If core, whether cut or sawn and whether quarter, half or all core taken.*	All diamond drill holes were 1/4 core sampled at intervals not less than 0.17 meters, not greater than 1 metres and where appropriate, to geological contacts

Criteria	JORC Code explanation	Comments
preparation	• *If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.*	All RC samples were put through a rifle splitter and into a pre number bag which was recorded on the log sheets. No moisture record has been preserved. RAB drilling was conducted under contract by Connector Drilling, with material laid out on the ground in one metre intervals and four metre composite spear samples subsequently collected for assaying. Bottom of hole samples were taken on a 2m interval.
	• *For all sample types, the nature, quality and appropriateness of the sample preparation technique.*	Diamond core sample intervals not less than 0.17 meters and not greater than 1 metre, geological/mineral boundaries as main sample interval boundaries. RC holes were drilled using a 5.5in face sampling bit and samples were collected through a cyclone and riffle splitter both mounted on a sample trailer, at one metre intervals. Sampling of individual metres was done using a one eighth riffle box splitter (the smaller split being collected in calico bags for assaying).
	• *Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.*	Although no QA/QC procedures were documented by the previous operators, assay reports show random repeat samples were submitted for approximately 1 in every 10 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.*	In addition to the randomly inserted repeat samples mentioned above, assay reports show 1 repeat samples were assayed at the lab for anomalous grades and two repeat samples were assayed for high grades.
	• *Whether sample sizes are appropriate to the grain size of the material being sampled.*	The sample sizes are considered to be appropriate for the type, style thickness and consistency of mineralisation. The sample size is also appropriate for the sampling methodology employed and the grades returned.
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.*	The assay method is designed to measure total gold in the sample. The laboratory procedures are appropriate for the testing of gold given the nature of mineralisation style. No record was made of charge size used in the assay
	• *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.*	Not used for grade reporting or interpretation
	• *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.*	The QC program was based around the insertion of duplicate samples to test repeatability of reported grades. Any subsequent exploration undertaken by Vango will bring QA/QC standards up to modern industry best practice not previously undertaken at the time of drilling reported in this announcement.
Verification of sampling and assaying	• *The verification of significant intersections by either independent or alternative company personnel.*	No record of independent verification exists
	• *The use of twinned holes.*	No twinned holes exist within the prospect area. Diamond drilling from underground, orientated perpendicular to the true strike of the mineralisation confirm the tenor of grade and intersections observed from surface RC and diamond drilling.
	• *Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.*	Drilling predates the widespread use of field base data loggers. Grades reported in this announcement were cross referenced with original logs and assay reports in annual exploration reports
	• *Discuss any adjustment to assay data.*	No adjustments were made to assay data presented in this report

Criteria	JORC Code explanation	Comments
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.*	The collars of all RC and diamond drill holes were surveyed by the Marymia Gold Project Survey Department. Diamond drill holes were surveyed via down hole cameras at intervals of 30 to 50m during drilling using an Eastman Single Shot Camera. A number of holes were also surveyed by Surtron after drilling had finished using either a gyro or DEMS tool. RC Holes were surveyed via a Single Shot Eastman Camera at 30 to 50m. Deeper RC holes were surveyed down the hole by Surtron on completion of drilling.
	• *Specification of the grid system used.*	Holes were drilled on a local grid, the "Resitan Grid" and have subsequently been converted to MGA94 z50
	• *Quality and adequacy of topographic control.*	A surveyed Digital Terrain model was provided by Dampier Gold (Project JV partner) to Vango which was used to define the current working surface.
Data spacing and distribution	• *Data spacing for reporting of Exploration Results.*	Drill spacing was on a nominal 15x10m grid for RC and Diamond in the indicated portion of the resource to 40x40m spacing in the inferred material at depth.
	• *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.*	The drill spacing and spatial distribution of assay results is sufficient to support the estimation of a mineral resource in accordance with the JORC (2012 Edition) Guidelines of material contained within this report and appropriate for the nature and style of mineralisation being reported
	• *Whether sample compositing has been applied.*	All samples included in resource calculations have been composited to 1m intervals to mitigate the bias in the resource estimation.
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.*	The majority of drilling is at azimuth 142^{o} which is perpendicular to the strike of the ore body, confirmed by diamond drilling. The orientation of the structure slightly swings to the North-West to the north of the K2 pit
	• *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.*	No drilling or sampling bias has been noted
Sample security	• *The measures taken to ensure sample security.*	No record has been kept relating to the security of the samples taken by previous operators
Audits or reviews	• *The results of any audits or reviews of sampling techniques and data.*	No record of audits or reviews by previous operators has been located

Section 2, Reporting of Exploration Results:

(Criteria listed in the preceding section also applies 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 Plutonic dome project ("project") inclusive of M52/183 where results are being reported is subject to a Joint Venture/Farm In Agreement with Dampier Resources Limited ("Dampier"). Under the terms of the agreement Vango is required to sole fund at least the initial $2 million in project within 9 months of the Joint Venture commencement to earn a 30% interest in the project. Vango has announced on the 11th September 2014, the completion of the first phase and earning 30% interest in the project. Vango has elected to continue with sole funding an additional $1 million to earn a cumulative 45% interest in the project. A total of $6 million of expenditure (inclusive of the $2 million completed and $1 million committed) is required to earn a 75% interest in the project. No heritage issues have been identified across M52/183
	· *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.*	M52/183 is a granted Mining Lease and is valid until 03/12/2031. At this time the tenement is believed to be in good standing. There are no known impediments to obtaining a licence to operate, other than those set out by statutory requirements which have not yet been applied for.
Exploration done by other parties	· *Acknowledgment and appraisal of exploration by other parties.*	Exploration by previous operators includes Dampier Gold Limited, Barrick and Resolute. These previous parties have completed open pit mining, geophysical data acquisition, soil sampling and drilling across the K2 deposit. The historical data within the database have been appraised and is of acceptable quality.
Geology	· *Deposit type, geological setting and style of mineralisation.*	The K2 deposit is located close to the middle of the Plutonic Well Greenstone Belt, which forms part of the Marymia Inlier. The Marymia Inlier is a granite-greenstone terrane situated between the Yilgarn and Pilbara Cratons in Western Australia. The Plutonic Well Greenstone Belt is a north-easterly trending belt approximately 50km long and 10km wide. It consists of predominantly mid to upper greenschist facies metamorphosed ultramafic volcanics, tholeiitic basalts, minor felsic volcanics and sediments. The local Geology of K2 is composed of a series of North-East, South-West trending mafics, ultramafics and metasedimentary lithologies metamorphosed to lower amphibolite facies. Gold Mineralisation within the K2 pit showed a strong association with lithological contacts and

Criteria	JORC Code explanation	Commentary
		high grade zones at the contact between a high-Fe and high-Mg amphibolite unit.
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:*	The drill holes reported in this announcement have the following parameters applied. All drill holes completed, including holes with no significant gold intercepts are reported in this announcement
	o *easting and northing of the drill hole collar*	Eastings and Northings are Resitan (Local) grid. These were converted to MG94z50 to verify locations.
	o *elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar*	RL is AHD
	o *dip and azimuth of the hole*	Dip is the inclination of the hole from horizontal (i.e. a hole drilled vertically down from the surface is -90^0). Azimuth is reported in degrees as the direction towards which the hole is drilled. The relevant surveying method is quoted in the collar table of the announcement.
	o *down hole length and interception depth*	Down hole length of the hole is the distance from the surface to the end of the hole, as measured along the drill trace. Interception depth is the distance down the hole as measured along the drill trace. Intersection width is the downhole distance of an intersection as measured along the drill trace.
	o *hole length.*	Hole length is the distance from the surface to the end of the hole, as measured along the drill trace.
	· *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.*	All results relating to the drill sections provided have been stated including "No significant intercepts". Inclusion of all historic data would make the tables too large although data included is representative of all drilling data.
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.*	Length weighted averages are used, uncut grades are reported. Anomalous grades have been top cut to 50g/t Au. Lower cut off is nominally 0.5g/t Au with a minimum modelled width of 2m downhole.

Criteria	JORC Code explanation	Commentary
	· *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.*	Sample lengths from RC/RAB drilling are all 1m lengths. As diamond core is cut to geological boundaries and incorporates shorter intervals, length weighted averaging has been used to make 1m downhole composites.
	· *The assumptions used for any reporting of metal equivalent values should be clearly stated.*	No Metal equivalents are reported.
Relationship between mineralisation widths and intercept lengths	· *These relationships are particularly important in the reporting of Exploration Results.*	The intersection width is measured down the hole trace and is not the true width. Cross sections provided in the announcement allow the relationship between true and down hole width to be viewed.
	· *If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.*	Observations of structures within the K2 open pit confirm the drilling direction is optimal for the mineralised zones at K2.
	· *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').*	All drill results within this announcement are downhole intervals only. True width is not known and will be calculated from further diamond drilling.
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.*	A plan view and drill sections have been provided in previous announcements.
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 results including those with no significant intersections have been reported in previous announcements.
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 exploration data is considered meaningful and material to this announcement.
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).*	An upgrade of the definitive feasibility study is currently underway to assist with an economic assessment towards the development potential.

Criteria	JORC Code explanation	Commentary
	· *Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.*	Future drilling areas have not currently been defined. Underground drilling will commence after the dewatering has been completed.

Section 3, Estimation and Reporting of Mineral Resources

(Criteria listed in Section 1, and where relevant Section 2 also apply to this section)

Criteria	JORC Code explanation	Commentary
Database integrity	· *Measures taken to ensure that data has not been corrupted by, for example, transcription or keying errors, between its initial collection and its use for Mineral Resource estimation purposes.*	Digital data has been imported and validated in Micromine then cross referenced with original exploration reports and cross sections.
	· *Data validation procedures used.*	Any errors recorded from the validation processing in Micromine are manually checked and correlated back to the original collection of data. This data is then referenced against collar maps and drill sections to confirm data accuracy
Site visits	· *Comment on any site visits undertaken by the Competent Person and the outcome of those visits.*	Multiple site visits have been made by the Competent Person
	· *If no site visits have been undertaken indicate why this is the case.*	Not applicable
Geological interpretation	· *Confidence in (or conversely, the uncertainty of) the geological interpretation of the mineral deposit.*	The interpretation of the deposit was carried out using a systematic approach and was of consistent orientations and dimensions as previous resource model used in the mining of, and observable in, the K2 pit. Given the close spacing of drill holes confidence in the geological interpretation is considered high
	· *Nature of the data used and of any assumptions made.*	The use of historical drilling provides a level of uncertainty as the validation and QA/QC of historic data is not always possible. Where instruments susceptible to magnetism have been used in downhole surveys azimuths have been assigned to the survey data. Generally this has only been applied to shallow holes drilled from surface, with valid azimuth and dip data available for the deeper holes used in the resource calculation
	· *The effect, if any, of alternative interpretations on Mineral Resource estimation.*	The previous resource model for K2 was constrained around high grade zones and not modelled to follow the controlling structure. This has resulted in significant increase in total tonnes and ounces

Criteria	JORC Code explanation	Commentary
	· *The use of geology in guiding and controlling Mineral Resource estimation.*	Inconsistencies in the logging of historic drill holes made detailed geological interpretation difficult. However the company believes this is mitigated by the current model matching the geological model generated in the mining of the K2 open pit
	· *The factors affecting continuity both of grade and geology.*	Continuity of geology and structure are consistent across drill hole sections and the nugget effect is considered low given the style of mineralisation
Dimensions	· *The extent and variability of the Mineral Resource expressed as length (along strike or otherwise), plan width, and depth below surface to the upper and lower limits of the Mineral Resource.*	Strike of Main Lode = 455m, Width= 1.25-16m, Depth= 100-220m. 11 distinct lodes have been modelled in the K2 Resource
Estimation and modelling techniques	· *The nature and appropriateness of the estimation technique(s) applied and key assumptions, including treatment of extreme grade values, domaining, interpolation parameters and maximum distance of extrapolation from data points. If a computer assisted estimation method was chosen include a description of computer software and parameters used.*	All Block model grades around the K2 pit were estimated by Ordinary Kriging (OK) in Micromine with Inverse Distance Weighting method used to calculate smaller lodes at K3 and K2SE. The deposit was domained into 11 individual lodes with each lode estimated using only the assays within that lode and snapped to composited 1m downhole intervals.
	· *The availability of check estimates, previous estimates and/or mine production records and whether the Mineral Resource estimate takes appropriate account of such data.*	The previous resource model for K2 prior to Vango's involvement was constrained around high grade zones and not modelled to follow the structure controlling mineralisation. The recent update completed by Vango incorporates higher SG values through the process of systematic sampling and laboratory analysis.
	· *The assumptions made regarding recovery of by-products.*	No consideration has been made to by-products
	· *Estimation of deleterious elements or other non-grade variables of economic significance (eg sulphur for acid mine drainage characterisation).*	No consideration has been made to deleterious elements or other non-grade variables of economic significance
	· *In the case of block model interpolation, the block size in relation to the average sample spacing and the search employed.*	Block size was 5m x 5m x 2.5m (x,y,z), with a subblock factor of 2 in each direction
	· *Any assumptions behind modelling of selective mining units.*	Small block sizes were selected to reflect the most probable selective mining method, which at K2 is underground mining.
	· *Any assumptions about correlation between variables.*	No assumptions made
	· *Description of how the geological interpretation was used to control the resource estimates.*	Blocks were constrained within wireframes at the boundary of mineralisation
	· *Discussion of basis for using or not using grade cutting or capping.*	Composite grade were top cut to 50 g/t Au to avoid the smearing of high grade assays through the resource
	· *The process of validation, the checking process used, the comparison of model data to drill hole data, and use of reconciliation data if available.*	Block model grades were visually checked against downhole assay grades. Reconciliation data was not available for the open pit
Moisture	· *Whether the tonnages are estimated on a dry basis or with natural moisture, and the method of determination of the moisture content.*	Tonnages are quoted as dry tonnes
Cut-off parameters	· *The basis of the adopted cut-off grade(s) or quality parameters applied.*	Cut off grades were chosen based on geological continuity and possible economic cut offs. These lower cut offs are comparable with other deposits of a similar mineralisation style in this geography

Criteria	JORC Code explanation	Commentary
Mining factors or assumptions	· *Assumptions made regarding possible mining methods, minimum mining dimensions and internal (or, if applicable, external) mining dilution. It is always necessary as part of the process of determining reasonable prospects for eventual economic extraction to consider potential mining methods, but the assumptions made regarding mining methods and parameters when estimating Mineral Resources may not always be rigorous. Where this is the case, this should be reported with an explanation of the basis of the mining assumptions made.*	Mineralisation at K2SE and K3 was modelled at a nominal 0.5 g/t Au cut off to reflect an open cut mining scenario. In the case of K2 a 3g/t Au cut off grade was applied to reflect the likely underground mining scenario.
Metallurgical factors or assumptions	· *The basis for assumptions or predictions regarding metallurgical amenability. It is always necessary as part of the process of determining reasonable prospects for eventual economic extraction to consider potential metallurgical methods, but the assumptions regarding metallurgical treatment processes and parameters made when reporting Mineral Resources may not always be rigorous. Where this is the case, this should be reported with an explanation of the basis of the metallurgical assumptions made.*	Nine composite samples were selected for metallurgical test work from the K2 deposit by Barrick Australia in 2005. Samples were selected from oxide, transitional and primary material. Recoveries all exceeded 90%. There is no apparent link between recovery rate and sample grade. The gold recoveries comparison for each oxidation state are listed below: - Oxide: Average Recovery 94.9% - Transitional: Average Recovery 92.7% - Primary: Average Recovery 93.5%
Environmental factors or assumptions	· *Assumptions made regarding possible waste and process residue disposal options. It is always necessary as part of the process of determining reasonable prospects for eventual economic extraction to consider the potential environmental impacts of the mining and processing operation. While at this stage the determination of potential environmental impacts, particularly for a greenfields project, may not always be well advanced, the status of early consideration of these potential environmental impacts should be reported. Where these aspects have not been considered this should be reported with an explanation of the environmental assumptions made.*	Underground Mining of the K2 resource will require dewatering of the open pit and existing underground workings. A mining proposal and relevant works approvals have been granted for dewatering K2 into the historical K1 Open Pit.
Bulk density	· *Whether assumed or determined. If assumed, the basis for the assumptions. If determined, the method used, whether wet or dry, the frequency of the measurements, the nature, size and representativeness of the samples.*	Specific Gravity values of 1.98 were assigned to ore blocks above the base of complete weathering, 2.54 to transitional material and 2.97 below the top of fresh surface. These results were through the analysis of historical diamond core by SGS laboratory with relevant industry best practices adhered to.
	· *The bulk density for bulk material must have been measured by methods that adequately account for void spaces (vugs, porosity, etc), moisture and differences between rock and alteration zones within the deposit.*	The bulk densities assigned take into account void space and vug spaces with differing rock and weathering types
	· *Discuss assumptions for bulk density estimates used in the evaluation process of the different materials.*	As mentioned above these values were lower than measurements reported by a previous operator, whose values seemed too high given the lithology and grade of the mineralised material
Classification	· *The basis for the classification of the Mineral Resources into varying confidence categories.*	Classification is based on drill spacing, Kriging efficiencies and grade variance to determine inferred and indicated resource categories and also determine where grade estimations do not satisfy JORC classification.

Criteria	JORC Code explanation	Commentary
	· *Whether appropriate account has been taken of all relevant factors (ie relative confidence in tonnage/grade estimations, reliability of input data, confidence in continuity of geology and metal values, quality, quantity and distribution of the data).*	All relevant factors have been accounted for including relative confidence in tonnage/grade estimations, reliability of input data, confidence in continuity of geology and metal values, quality, quantity and distribution of the data)
	· *Whether the result appropriately reflects the Competent Person's view of the deposit.*	The result appropriately reflects the competent person's view of the deposit
Audits or reviews	· *The results of any audits or reviews of Mineral Resource estimates.*	This resource has not been externally audited or reviewed. An internal peer review has been conducted
Discussion of relative accuracy/ confidence	· *Where appropriate a statement of the relative accuracy and confidence level in the Mineral Resource estimate using an approach or procedure deemed appropriate by the Competent Person. For example, the application of statistical or geostatistical procedures to quantify the relative accuracy of the resource within stated confidence limits, or, if such an approach is not deemed appropriate, a qualitative discussion of the factors that could affect the relative accuracy and confidence of the estimate.*	The mineral estimate quoted is considered fair and robust. The justifications for classification are documented above.
	· *The statement should specify whether it relates to global or local estimates, and, if local, state the relevant tonnages, which should be relevant to technical and economic evaluation. Documentation should include assumptions made and the procedures used.*	This resource report relates to the K2 area of the Plutonic Dome project. Further information towards the most recent economic analysis of the project is available in the announcement "*K2 Definitive Feasibility Study Completion"* on the 1st of July 2014.
	· *These statements of relative accuracy and confidence of the estimate should be compared with production data, where available.*	No previous production data was available for comparison with the resources generated although the orientation of the resource is consistent with previous models and observable structures in walls of the K2 open pit

Section 4, Estimation and Reporting of Ore Reserves

Criteria	JORC Code explanation	Commentary
Mineral resource Estimate for conversion to Ore Reserves	• *Description of the Mineral Resource estimate used as a basis for the conversion to an Ore Reserve.* • *Clear statement as to whether the Mineral Resources are reported additional to, or inclusive of, the Ore Reserves.*	The Ore Reserve estimate is based on the Mineral Resource estimate carried by Geonomics Australia Pty Ltd. The Mineral Resources are reported inclusive of Ore Reserves.
Site visits	• *Comment on any site visits undertaken by the Competent Person (s) and the outcome of those visits.*	A site visit has been conducted by the Competent Person. The visit included inspection of potential surface infrastructure positions as well as pre-existing decline development and road system.
Study Status	• *The type and level of study undertaken to enable Mineral Resources to be converted to Ore Reserves*	Feasibility level studies have been completed for all areas of the K2 Underground Project. Ore Reserve estimates are based around the assumptions completed for the K2 Project Feasibility Study.
Cut-off Parameters	• *The basis of the cut-off grade(s) or quality parameters applied*	Cut-off grades were determined based on unit costs from the "Feasibility Level" mining cost model
Mining Factors or Assumptions	• *The method and assumptions used as reported in the Pre-Feasibility or Feasibility Study to convert the Mineral Resource to an Ore Reserve (i.e. either by application of appropriate factors by optimisation or by preliminary or detailed design).* • *The choice, nature and appropriateness of the selected mining method(s) and other mining parameters including associated design issues such as pre-strip, access, etc.* • *The assumptions made regarding geotechnical parameters (e.g. pit slopes, stope sizes, etc.), grade control and pre-production drilling.*	The Ore Reserve estimate has been calculated by generating detailed mining shapes for each stoping block as well as development. Designed stope shapes include planned dilution, being waste material that is located within the minable stope shape. Additional unplanned dilution is also generally incurred from the walls of stopes due to re-distribution of stress within the rock mass as voids are created in the mine, blast damage, poor mining practice (such as poor blasthole drilling setup) this additional material is also included in Ore Reserve Estimate. The selected mining methods for the K2 project is long hole open stoping which is widely used in many underground mines in Western Australia and is deemed appropriate considering the nature of the ore body. In consultation with geotechnical consultants Ground Control Engineering (GCE) geotechnical parameters have been set out for the size of the stoping blocks as well as support standards and development stand-off distances.

Criteria	JORC Code explanation	Commentary
		All mining shapes included in the Ore Reserve estimate abide by the recommendations supplied by GCE.
	• *The major assumptions made and Mineral Resource model used for pit and stope optimisation (if appropriate).*	Stope sizes are generally 2 mW x 16 mH x 37 mL and have been created to suit the Mineral Resource. Geotechnical assessment of the mineralised zone is also favourable for the selected mining method.
	• *The mining dilution factors used.*	A 10 % unplanned dilution factor has been calculated by Entech. Entech considers this to be appropriate given the ground conditions and proposed style of mining
	• *The mining recovery factors used.*	A mining recovery factor of 95% has been applied post geological interrogation to generate the final diluted and recovered Ore Reserve estimate. This mining recovery is applied to allow for any ore loss due to mining related issues such as; underbreak due to poor drilling and blasting techniques, stope bridging or freezing or material being left in stopes due inaccessibility.
	• *Any minimum mining widths used.*	Minimum mining width for stoping is 1.5m.
	• *The manner in which Inferred Mineral Resources are utilised in mining studies and the sensitivity of the outcome to their inclusion.* • *The infrastructure requirements of the selected mining methods*	No Inferred Mineral Resources have been included in the Ore Reserve Estimate. Any Inferred Mineral Resource contained within a mining block (stope or development) is classified as waste and is used to dilute the overall Ore Reserve. Infrastructure required for the proposed K2 Project has been accounted for and included in all work leading to the generation of the Ore Reserve estimate. The K2 Project infrastructure includes: o All site surface infrastructure, including: o Offices, workshops, warehouses and associated facilities o Power Station o Refuelling Facility o All power and pumping reticulation will be fed through decline development, ventilation rises and service holes drilled in close proximity to the decline to minimise cable and pipe runs along the decline path. o Ventilation fans will be installed underground in an access to the pre-mined K2 pit to supply fresh air to underground workings. o Escapeway ladderways will be installed in separate air legged rises providing secondary means of egress from the UG mine. Infrastructure required for the generation of the Ore Reserve that is provided by NST at Plutonic Mine Site or already in place include: o Camp o Airstrip o Access Road o Boxcut; and o 800 m of decline development
Metallurgical Factors or Assumptions	• *The metallurgical process proposed and the appropriateness of that process to the style of mineralisation.*	Vango has an agreement with Northern Star Resources to treat ore from K2 through Northern Star's existing Plutonic Gold Mine Processing Plant
	• *Whether the metallurgical process is well tested technology or novel in nature.*	The Plutonic Processing Plant operates off CIL methods, which is considered to be standard industry processing methods.
	• *The nature, amount and representativeness of metallurgical test work undertaken, the nature of the metallurgical domaining applied and*	Extreme Metallurgy Pty Ltd has conducted reviews of the supplied metallurgical test work for the K2 orebody. Extreme have provided information on the feasibility of

Criteria	JORC Code explanation	Commentary
	the corresponding metallurgical recovery factors applied.	treatment and expected metal recovery.
	• *Any assumptions or allowances made for deleterious elements.*	Metallurgical recovery factors are as follows: O Fresh – 90%
	• *The existence of any bulk sample or pilot scale test work and the degree to which such samples are considered representative of the orebody as a whole.*	Bulk sampling and pilot scale testing have not been conducted as part of this study and are not deemed necessary. The existing Plutonic processing facility is currently in operation treating similar ore, and K2 ore has been mined and processed successfully in the past.
	• *For minerals that are defined by a specification, has the ore reserve estimation been based on the appropriate mineralogy to meet the specifications.*	Minerals are not defined by a specification
Environmental	• *The status of studies of potential environmental impacts of the mining and processing operation. Details of waste rock characterisation and the consideration of potential sites, status of design options considered and, where applicable, the status of approvals for process residue storage and waste dumps should be reported.*	Environmental impacts and hazards are being considered as part of the DMP application process. Waste rock characterisation and hydrogeological investigations indicates the rock mass is considered non-acid forming. Tailings from the K2 ore processing will be stored within the Tailings Storage Facility (TSF) at Plutonic. It is expected that permitting for the project will not be unreasonably withheld.
Infrastructure	• *The existence of appropriate infrastructure: availability of land for plant development, power, water, transportation (particularly for bulk commodities), labour, accommodation; or the ease with which the infrastructure can be provided, or accessed.*	All infrastructure required for the processing and mining of the Ore Reserve is existing and will be operational before the commencement of underground operations.
Costs	• *The derivation of, or assumptions made, regarding projected capital costs in the study.*	Capital costs have been sourced from supplier and contractor quotes through the "feasibility study" process.
	• *The methodology used to estimate operating costs.*	Operating costs have been based on supplier and contractor estimates, equipment manufacturer information and labour rates.
	• *Allowances made for the content of deleterious elements.*	No contingency has been provided for within these estimates
	• *The derivation of assumptions made of metal or commodity price(s), for the principal minerals and co- products.*	Gold price assumptions have been calculated by taking discounts to 4 year trailing average gold price
	• *The source of exchange rates used in the study.*	Based on recent average trading range between USD and AUD.
	• *Derivation of transportation charges.*	Transport costs have been sourced from contractor quotes through the "feasibility study" process
	• *The basis for forecasting or source of treatment and refining charges, penalties for failure to meet specification, etc.*	Processing costs have been sourced as per the Binding Ore Treatment Agreement with Northern Star Resources Limited.
	• *The allowances made for royalties payable, both Government and private.*	Government Taxes and Royalties and IRC Royalties have

Criteria	JORC Code explanation	Commentary
		been provided for .
Revenue factors	• *The derivation of, or assumptions made regarding revenue factors including head grade, metal or commodity price(s) exchange rates, transportation and treatment charges, penalties, net smelter returns, etc.*	Mine optimisation and designs used a gold price of US $1,220 / oz and AU:US exchange rate of 1:0.87. Final revenue modelling of the project also used a gold price of US $1,220 / oz and AU:US exchange rate of 1:0.87
	• *The derivation of assumptions made of metal or commodity price(s), for the principal metals, minerals and co-products.*	Gold price assumptions have been calculated by taking discounts to 4 year trailing average gold prices.
Market Assessment	• *The demand, supply and stock situation for the particular commodity, consumption trends and factors likely to affect supply and demand into the future.*	Gold doré from the mine is to be sold at the Perth Mint.
	• *A customer and competitor analysis along with the identification of likely market windows for the product.*	Many local and international operations are operating at C3 cash costs above current prices or hedges. Supply likely curtailed if current pricing and revenues structures maintained. Active international Reserve Bank, hedge fund and gold fund physical transfers.
	• *Price and volume forecasts and the basis for these forecasts.*	Gold price assumptions have been calculated by taking discounts to 4 year trailing average gold prices. Gold doré from the mine is to be sold at the Perth Mint.
	• *For industrial minerals the customer specification, testing and acceptance*	No industrial minerals.
Economic	• *The inputs to the economic analysis to produce the net present value (NPV) in the study, the source and confidence of these economic inputs including estimated inflation, discount rate, etc.*	The Ore Reserve estimate is based on a financial model for that has been prepared at a "feasibility study" level of accuracy economic modelling. All inputs from underground operations, processing, transportation and sustaining capital as well as contingencies have been scheduled and evaluated to generate a full life of mine cost model. Economic inputs have been sourced from suppliers or generated from database information relating to the relevant area of discipline. A discount rate of 8% has been applied. The NPV of the project is positive at the assumed commodity price.
	• *NPV ranges and sensitivity to variations in the significant assumptions and inputs.*	The Ore Reserve is sensitive to fluctuation in gold price. A reduction in price renders the Project cost negative
Social	• *The status of agreements with key stakeholders and matters leading to social licence to operate*	To the best of the Competent Persons knowledge all agreements are in place and are current with all key stakeholders including traditional owner claimants.
Other	*To the extent relevant, the impact of the following on the project and/or on the estimation and classification of the Ore Reserves:* • *Any identified material naturally occurring risks.*	The site is distant from the Western Australian Coastline, which is prone to cyclone activity during summer. Locally heavy rainfall occurs during this period.
	• *The status of material legal agreements and marketing arrangements.*	Vango is required to spend a minimum of $6million over a 2 year period to earn 75% interest in the Plutonic Dome Gold Project. Currently Vango holds a 30% equity interest in the Project.

Criteria	JORC Code explanation	Commentary
	• *The status of governmental agreements and approvals critical to the viability of the project, such as mineral tenement status, and government and statutory approvals.*	To the best of the Competent Persons knowledge all agreements are in place and are current with all key stakeholders including traditional owner claimants. A mining proposal for the commencement of mining activities at K2 is to be submitted imminently.
Classification	*The basis for the classification of the Ore Reserves into varying confidence categories.*	
	• *Whether the result appropriately reflects the Competent Person's view of the deposit.*	The Competent Person believes the classification of the Underground Mineral Resource and hence the conversion to Ore Reserve is appropriate.
	• *The proportion of Probable Ore Reserves that have been derived from Measured Mineral Resources (if any).*	No Measured material has been converted to a Proven Ore Reserve. Indicated material has been converted to a Probable Ore Reserve. The Ore Reserve is based on Probable material; no Proven Ore Reserves are reported.
Audits or reviews	• *The results of any audits or reviews of Ore Reserve estimates.*	The Ore Reserve has been peer reviewed internally and is in line with current industry standards.
Discussion of relative accuracy/confidence	*Where appropriate a statement of the relative accuracy and confidence level in the Ore Reserve estimate using an approach or procedure deemed appropriate by the Competent Person. A qualitative discussion of the factors which could affect the relative accuracy and confidence of the estimate.*	
	• *The statement should specify whether it relates to global or local estimates, and, if local, state the relevant tonnages, which should be relevant to technical and economic evaluation. Documentation should include assumptions made and the procedures used.*	The design, schedule and financial model on which the Ore Reserve is based has been completed to a "feasibility study" standard, with a corresponding level of confidence.
	• *Accuracy and confidence discussions should extend to specific discussions of any applied Modifying Factors that may have a material impact on Ore Reserve viability, or for which there are remaining areas of uncertainty at the current study stage.*	All modifying factors have been applied to design mining shapes on a global scale. Results and estimates should be viewed on basis of +/- 15%, based on Competent Person study assessment, audit and review.