

An amended Quarterly Activities Report for December 2013 is attached which corrects the amount of gold sales for the quarter.

**Dom Francese Company Secretary** 

## 30 January 2014

#### **ISSUED CAPITAL**

Ordinary Shares: 365M

#### DIRECTORS

Chairman: Robert Kennedy Non-Executive Directors: Kevin Lines Michael Bohm Managing Director: lan Gordon

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#### RAMELIUS RESOURCES LIMITED

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**Operations Office** 

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ACN 001 717 540 ASX code: RMS

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For Immediate Release 30 January 2014

## **Quarterly Report for the Period Ending 31 December 2013**

### **HIGHLIGHTS – OPERATIONS & DEVELOPMENT**

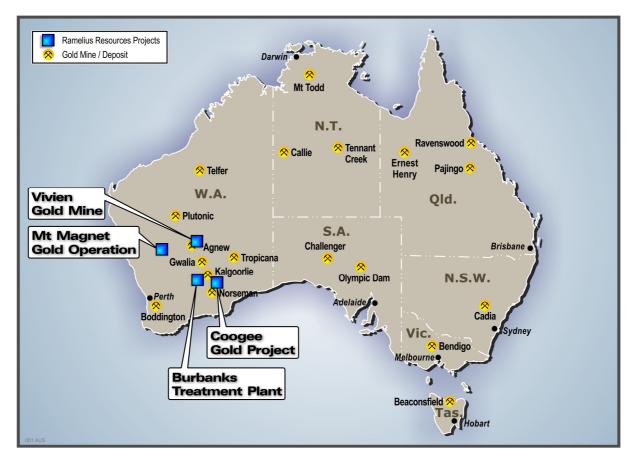
- Group quarterly production of 21,795 fine ounces of gold at a cash cost of A\$1,450 per ounce (Sept Qtr: A\$1,301).
- Mt Magnet gold production was 16,036 ounces with 16,753 fine ounces of gold refined at a total cash cost of A\$1,531 per ounce (Sept Qtr: A\$1,300). Following installation of a smaller capacity ball mill motor in November 2013, Mt Magnet produced 6,587 ounces in the month of December at a total cash cost of A\$1,208 per ounce. Mining at the high grade Western Queen South deposit continued with a further 69,403 tonnes of high grade ore mined, of which 30,967 tonnes was delivered to Mt Magnet.
- Mining continued at the Coogee open pit, with the Burbanks Mill achieving gold production of 6,094 ounces with 5,042 fine ounces of gold refined at a total cash cost of A\$1,180 per ounce (Sept Qtr: A\$1,329).
- A 14 hole Reverse Circulation (RC) & diamond drill programme was completed at the Vivien Gold Project during the Quarter, as work also commenced in terms of a revised mine feasibility study and statutory approvals.

### **PRODUCTION GUIDANCE – MARCH 2014 QUARTER**

- Mt Magnet (inclusive of Western Queen South) is expected to produce 20,000 ounces of gold in the March 2014 quarter, at a total cash cost of A\$1,300 per oz.
- Coogee is expected to produce 7,000 ounces of gold in the March 2014 quarter, at a total cash cost of A\$1,000 per oz.

### **HIGHLIGHTS – CORPORATE**

- Quarterly gold sales of A\$27.8M at an average sale price of A\$1,375 / oz
- A\$16M gold pre-pay facility with Deutsche Bank executed
- Cash and gold on hand of A\$32.5M at the end of the quarter



#### Figure 1: Ramelius Project Locations - Western Australia

Ramelius has active gold mining operations at Mt Magnet and Coogee / Burbanks and is purchasing the high grade Vivien gold deposit near Agnew. All of these projects are in Western Australia.

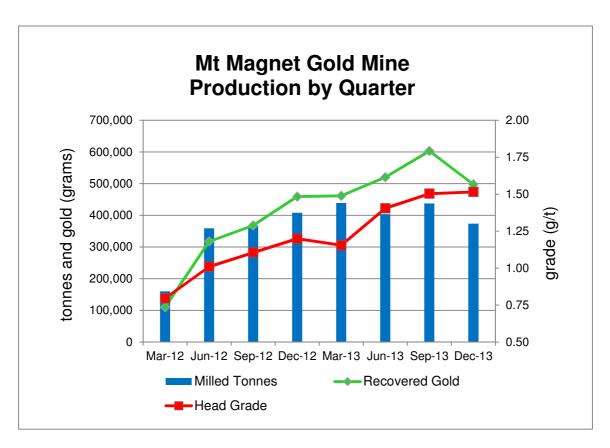
## **PRODUCTION SUMMARY**

Operation	Mine Production ROM (t)	Milled Tonnes (t)	Head Grade (g/t Au)	Gold Recovery (%)	Production (recovered ounces)	Fine Gold Production (ounces)	Cash Cost (A\$/oz)
Mt Magnet*	335,732	373,984	1.52	88	16,036	16,753	1,531
Burbanks	64,539	34,627	5.58	98	6,094	5,042	1,180
Total	400,271	408,611	1.86	89	22,130	21,795	1,450

\*includes Western Queen South

### MT MAGNET GOLD MINE

Production at Mt Magnet for the quarter saw gold output fall due to the failure of the ball mill drive motor. This was partially offset by milling of higher grade ore and resulted in mill production of 16,036 ounces of gold recovered and 16,753 fine ounces of gold poured.



### Figure 2: Mt Magnet Quarterly Production

The Checkers mill processed 373,984 dry tonnes at a head grade of 1.52 g/t Au for the Quarter. The mill feed grade was the highest achieved to date, with a head grade of 1.73 g/t Au in December 2013.

Failure of the 1,650kW ball mill motor occurred on 9 November 2013. Four full days of milling were lost, after which a bypass circuit was enabled using the SAG mill only and allowing a reduced throughput. By 20 November 2013, a smaller capacity motor of 1,200kW was installed which allowed milling to resume at a throughput rate of around 85%. The original motor is being rebuilt and is expected to be reinstalled and operating in February 2014.

Mining continued to focus on the Saturn pit within the Galaxy area. Further steps were taken to separate and prioritise high grade ore availability during the period of reduced mill throughput. Historic Hill 50 tails material was also milled during the quarter to buffer the mostly fresh Saturn ore feed within the SAG mill. Western Queen South high grade ore was also milled during the quarter.

Total cash costs for the quarter were A\$25.7M, with a further A\$3.5M expended on capital being primarily a tailings dam lift (A\$2.1M) and the Western Queen South haul road upgrade work (A\$1.4M).

#### WESTERN QUEEN SOUTH OPEN PIT

Mining at Western Queen South continued throughout the quarter and although a wall failure interrupted progress in December 2013, good ore production was achieved. Ore is stockpiled at site before haulage to and processing at Mt Magnet.

Estimated ore production was 69,403 t @ 4.02 g/t for 8,972 oz with mining progressing into fresh, higher grade material. On 4 December 2013, a slip occurred on the western side of the pit wall beneath the ramp. Prism monitoring had shown movement in this area prior to the failure and no injury or equipment damage occurred. After geotechnical inspection a remediation plan was enacted. This involved mining into the failure area to remove unstable material, forming a flatter wall profile, sheeting with fresh waste rock and bunding the toe of the failure zone. By the end of the quarter the slip area was remediated and normal mining activity resumed.



Figure 3: Mining at Western Queen South - Remediated west wall slip area (above excavator) Jan 2014

Upgrade work to the haulage route continued throughout the quarter, in parallel with limited ore haulage operations. To date, haulage has been limited to the use of single trucks of 30 tonne capacity. A total of 30,967 t @ 4.62 g/t for 4,601 oz was hauled and ore stockpiled at the pit at the end of the quarter was estimated at 62,918 t @ 3.47 g/t for 7,019 oz. The use of larger road trains is expected to commence in February 2014, which will allow higher rates of ore movement from that time.

## **COOGEE OPEN PIT**

Excellent progress was made at Coogee during the quarter with mining proceeding ahead of plan. The Stage 1 pit was completed to the 260mRL and mining of high grade ore commenced during the quarter. The second and final grade control drill campaign was conducted in early December 2013. Mining achieved estimated production of 64,539 t @ 3.92 g/t for 8,141 oz. Completion of mining is expected in the March 2014 quarter. Total capital expenditure at Coogee during the quarter was A\$232K primarily being haul road upgrade work (\$222K).



Figure 4: Mining at Coogee - looking south with ore body footwall on east side - December 2013

## **BURBANKS MILL**

Toll milling was completed on 18 October 2013 and milling operations then changed over to Coogee ore. Milling commenced on lower grade supergene ore and switched to high grade main zone ore in November 2013. Grades have reconciled above estimated mined grades and mill production by the end of the quarter was 34,627 t @ 5.58 g/t for 6,094 oz recovered, whilst fine gold poured was 5,042 ounces.

Total cash costs for the quarter were A\$6M, with a further A\$0.5M expended on capital being primarily a tailings dam lift (A\$0.4M).

### **PROJECT DEVELOPMENT**

#### Vivien Gold Project

Ramelius undertook a diamond drilling campaign at Vivien in the December 2013 quarter. Drilling included 3 geotechnical HQ holes and 3 resource infill NQ holes. Results were similar to expectations with some excellent grades returned in high-grade areas. Drill core also displays the excellent ground conditions present in fresh lode material and surrounding dolerite host unit. Results are included in the Exploration Summary below.

A revised Resource model was in progress at end of the quarter and further mine evaluation work is planned for the March 2014 Quarter.

#### **EXPLORATION SUMMARY**

Exploration drilling was undertaken at Vivien and Coogee during the quarter. Total exploration and resource development expenditure for the quarter was \$2.77M (incl. project generation of \$107K).

## **AUSTRALIAN PROJECTS**

### Vivien Deeps

Encouraging high grade gold intersections have been returned from exploration drilling at the Company's Vivien Gold Project, located 20km west of Leinster in the Eastern Goldfields of Western Australia.

The Company embarked on a programme of step-out exploration drilling at Vivien, in addition to the development drilling referred to above. The drilling programmes were initiated following the first payment of A\$5 million to Agnew Gold Mining Company Pty Ltd for the acquisition of the advanced gold project, as announced on 3 October, 2013.

Assay results are now available for all the diamond holes (VVDD1000 to VVDD1018A), testing below the historical Vivien pit and the modelled north-eastern plunge extensions to the main lode. An aggregate 5,685.92m has been drilled by Ramelius since the first payment was made in October 2013 to acquire the project.

Better drill intersections returned to date include:

- 10.0m at 4.69 g/t Au from 360.0m in VVDD1001
- 5.40m at 8.28 g/t Au from 310.0m in VVDD1003
- 6.70m at 8.29 g/t Au from 241.6m in VVDD1005; and 6.50m at 30.4 g/t Au from 257.7m
- 2.57m at 18.16 g/t Au from 396.3m in VVDD1014 and
- 5.10m at 6.43 g/t Au from 182.9m in VVDD1017

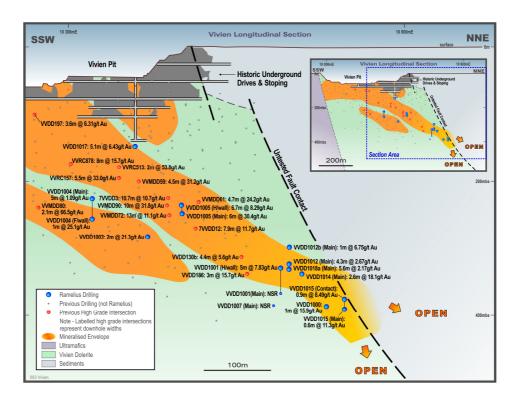


Figure 5: Longitudinal section – Vivien gold project

The drill hole intersections include encouraging hangingwall mineralisation of **6.70m at 8.29 g/t Au** in VVDD1005 (Figure 5). The hangingwall intersection compliments the main lode intersection of **6.50m @ 30.4 g/t Au** within the same hole and confirms good continuity of mineralisation around historical drill holes.

It also highlights the potential for greater thicknesses of high grade gold mineralisation to be discovered below the Vivien pit. True width of the main lode intersections are estimated at 55-60% of the reported down hole width while true widths of the interpreted hangingwall splays are up to 90% of the reported down hole widths.

A table of anomalous results from the December 2013 quarter drilling programme is presented in Appendix 1.

#### **Coogee Extensions**

Three RC drill holes (CORC0007 – CORC0009) were drilled during the quarter for an aggregate 714m. The holes were designed to test for economic gold and copper mineralisation to the north of the Coogee open pit. Anomalous gold and copper assays up to **16m at 0.54 g/t Au and 0.12% Cu** from CORC0008 have been returned. The copper mineralisation is manifesting as disseminated chalcopyrite and bornite. True widths are estimated to be 100% of the reported down hole intersections. The anomalous drill intersection in CORC0008 is associated with magnetite alteration and is located along the northern edge of a 200m diameter magnetic anomaly; as defined in the regional aeromagnetic data (Figure 6).

Previous gold exploration drilling results were reported in the June 2012 Quarter, but the significance of the gold-copper-magnetite association had not been fully investigated at that time. The reported significant gold intersection in CORC0006 returned **3m at 1.91% Cu**.

A table of anomalous results from the December 2013 quarter drilling programme is presented in Appendix 2.

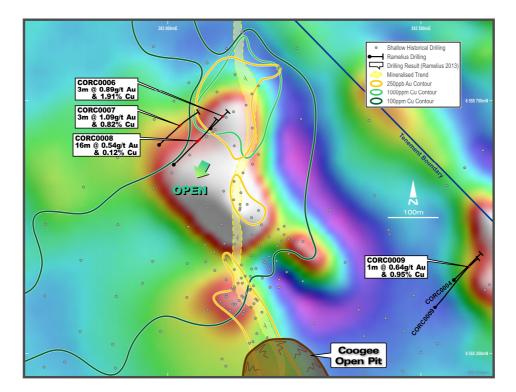


Figure 6: Plan view – Coogee gold project

## CORPORATE & FINANCE

Gold sales for the December 2013 quarter were A\$27.8M at an average price of A\$1,375 / ounce.

At 31 December, 2013 the Company held A\$28.3M of cash and A\$4.2M of gold bullion.

During the Quarter, the Company entered into a A\$16M gold pre-pay facility with Deutsche Bank which was drawn down in early December 2013. Under the terms of the facility and consistent with the Company's existing gold put option acquisition programme, Ramelius has purchased put options over 7,500 ounces of gold per month at a strike price of A\$1,200 per ounce for the period from April to August 2014. The facility is secured against the Company's Mt Magnet assets and will be fully repaid through the delivery of 1,492 ounces of gold per-month from January to August 2014.

As previously advised, the facility enables Ramelius to fast track the acquisition and potential pre-mining work at the high-grade Vivien Gold Project in Western Australia and provides flexibility for the Company to take advantage of potential opportunities to enhance the expanding Mt Magnet gold project via acquisition and/or development of a new satellite open pit.

Hole Id	Easting	Northing	Az/Dip	F/Depth (m)	From (m)	To (m)	Interval (m)	g/t Au
VVDD1000	261314	6903285	297/-60	420	380.20	381.20	1.00	1.91
					385.90	386.90	1.00	1.44
					397.00	398.00	1.00	4.09
					402.66	403.66	1.00	15.9*
VVDD1001**	261279	6903244	297/-60	426	270.00	271.00	1.00	2.90
					306.00	309.00	3.00	2.38
					360.00	370.00	10.0	4.69
				Incl.	363.00	368.00	5.00	7.83
					391.00	392.00	1.00	2.24
					407.00	408.48	1.48	3.74*
VVDD1002	261314	6903285	297/-57	180			precollar	only
VVDD1003	261138	6903115	297/-60	360.1	310.00	315.40	5.40	8.28*
				Incl.	311.85	313.85	2.00	21.3*
VVDD1004**	261045	6903058	297/-60	290	248.00	253.00	5.00	1.09*
					287.00	288.00	1.00	25.1
VVDD1005**	261086	6903192	297/-69	285	241.60	248.30	6.70	8.29
				Incl.	257.70	264.20	6.50	30.4*
				+	257.70	261.70	4.00	48.5
					258.95	259.70	0.75	150.3
VVDD1006	261278	6903202	297/-61	109			precollar	only
VVDD1007**	261275	6903203	297/-65	474.1	432.00	433.00	1.00	1.11
					440.00	443.00	3.00	0.96*
VVDD1008	260900	6902902	297/-56	169.95	169.00	169.95	0.95	2.25
			007/00	050.45			Geotech	hole
VVDD1009	260988	6902975	297/-60	253.45			Geotech	NSR hole
VVDD1010	261277	6903244	297/-57	54			precollar	only
VVDD1011	261276	6903244	297/-58	138			precollar	only
VVDD1012B	261288	6903262	300/-55	404	370.20	372.20	2.00	3.64
VVDD10128	261310	6903287	297/-64	42	010.20	072.20	precollar	only
VVDD1013	261312	6903289	297/-61	419.97	393.30	394.30	1.00	1.75
	201012	0303203	2317-01	413.37	396.30	398.87	2.57	18.16*
VVDD1015	261315	6903291	308/-61	460.21	409.67	410.57	0.90	8.49
VVDD I VIO	201010	0000201	000/01	100.21	427.36	427.96	0.60	11.3*
					445.20	445.90	0.70	3.83
VVDD1016	261283	6903242	297/-72	205			precollar	only
VVDD1017	260860	6903261	126/-52	212.97	175.00	178.90	3.90	4.06
					182.90	188.00	5.10	6.43*
VVDD1018A	261094	6903180	358/-62	402.65	20.00	28.00	8.00***	2.00
					118.55	121.00	2.45	3.44
					169.50	169.80	0.30	8.68
					246.30	246.80	0.50	4.06
					249.80	252.80	3.00	1.23
					256.85	257.85	1.00	1.81
					296.50	297.30	0.80	1.15
					301.00	303.00	2.00	1.19
					321.00	321.60	0.60	1.04
					356.00	361.60	5.60	2.17*

Appendix 1: Significant (>0.50 g/t Au) diamond drilling results for the Vivien gold project – Lei
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Reported significant gold assay intersections (using a 0.50 g/t Au lower cut) are calculated over a minimum down hole interval of 1m at plus 0.50 g/t gold and may contain up to 1m of internal dilution. NSR denotes no anomalous assays above 0.50g/t Au. BLD denotes below analytical detection. Main Lode gold determination was by Screened Fire Assay, using 50gm charges with AAS finishes and a lower limit of detection of 0.01 g/t Au, otherwise standard Fire Assay techniques using a 50 gram charge and AAS finish were employed (LLD 0.01 g/t Au). True widths are estimated to represent 55-60% of the reported Main Lode down hole intersections.

\* Denotes Main Lode intersection

\*\* Denotes intersections previously reported to the ASX on 13/11/2013 and included here for completeness (light grey font)

\*\*\* Denotes 4m composite RC samples

Hole Id	Easting	Northing	Az/Dip	F/Depth (m)	From (m)	To (m)	Interval (m)	g/t Au	% Cu
CORC0006	393085	6555695	046/-70	140	121	124	3	0.89*	1.91
CORC0007	392983	6555663	047/-60	234	7	8	1	0.67	NSR
					105	106	1	1.00	0.87
					117	120	3	1.09	0.82
					213	214	1	0.51	NSR
CORC0008	393012	6555623	044/-56	240	91	92	1	0.57	0.19
					96	98	2	0.95	0.86
					118	134	16	0.54	0.12
CORC0009	393528	6555341	040/-56	240	203	204	1	0.64	0.95

Appendix 2: Significant (>0.50 g/t Au) RC drilling results for the Coogee gold project - Kambalda WA

Reported significant gold assay intersections (using a 0.50 g/t Au lower cut) are calculated over a minimum down hole interval of 1m at plus 0.50 g/t gold and may contain up to 1m of internal dilution. NSR denotes no anomalous assays above 0.50g/t Au or above 0.1% Cu. BLD denotes below analytical detection. Gold determination was by Fire Assay, using 50gm charges with AAS finishes and a lower limit of detection of 0.01 g/t Au. Trace element analysis was by multi-acid (4 acid) digestion and AES finish. True widths are estimated to represent 100% of the reported down hole intersections

\* Gold intersection in CORC0006 previously reported in June 2012 Quarter.

The Information in this report that relates to Exploration Results is based on information compiled by Kevin Seymour.

Kevin Seymour is a Member of the Australasian Institute of Mining and Metallurgy and has sufficient experience which is relevant to the styles of mineralisation and type of deposits under consideration and to the activity he is undertaking to qualify as a Competent Person as defined in the 2004 Edition of the Australasian Code of Reporting of Exploration Results, Mineral Resources and Ore Reserves. Kevin Seymour is a full-time employee of the Company and consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

The Information in this report that relates to resource drilling, mineral resources, ore reserves and estimated mine grade is based on information compiled by Rob Hutchison.

Rob Hutchison is a Member of the Australasian Institute of Mining and Metallurgy and has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity he is undertaking to qualify as a Competent Person as defined in the 2004 Edition of the Australasian Code of Reporting of Exploration Results, Mineral Resources and Ore Reserves. Rob Hutchison is a full-time employee of the Company 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 report

## **Section 1 Sampling Techniques and Data**

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

Criteria	JORC Code explanation	Commentary
Sampling techniques	<ul> <li>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.</li> <li>Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.</li> <li>Aspects of the determination of mineralisation that are Material to the Public Report.</li> <li>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.</li> </ul>	<ul> <li>The mineralisation was systematically sampled using industry standard 1m intervals, collected from reverse circulation (RC) drill holes.</li> <li>Drill hole locations were designed to allow for spatial spread across the interpreted mineralised zone. All RC samples were riffle split to 3-4kg samples on 1m metre intervals.</li> <li>Standard fire assaying was employed using a 50gm charge with an AAS finish. Trace element determination was undertaken using a multi (4) acid digest and ICP- AES finish.</li> </ul>
Drilling techniques	<ul> <li>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).</li> </ul>	<ul> <li>Drilling was completed using best practice 5 <sup>3</sup>/<sub>4</sub>" face sampling RC drilling hammers.</li> </ul>
Drill sample recovery	<ul> <li>Method of recording and assessing core and chip sample recoveries and results assessed.</li> <li>Measures taken to maximise sample recovery and ensure representative nature of the samples.</li> <li>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.</li> </ul>	<ul> <li>Bulk RC drill holes samples were visually inspected by the supervising geologist to ensure adequate clean sample recoveries were achieved. Any wet, contaminated or poor sample returns were flagged and recorded in the database to ensure no sampling bias was introduced.</li> <li>Zones of poor sample return are recorded in the database and cross checked once assay results are received from the laboratory to ensure no misrepresentation of sampling intervals has occurred. Of note, excellent RC drill recovery is reported from all RC holes at Coogee.</li> </ul>

Criteria	JORC Code explanation	Commentary
Logging	<ul> <li>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.</li> <li>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.</li> <li>The total length and percentage of the relevant intersections logged.</li> </ul>	<ul> <li>All RC drill samples are geologically logged on site by professional geologists. Details on the host lithologies, deformation, dominant minerals including sulphide species and alteration minerals plus veining are recorded relationally (separately) so the logging is interactive and not biased to lithology.</li> <li>Drill hole logging of RC chips is qualitative on visual recordings of rock forming minerals and quantitative on estimates of mineral abundance.</li> <li>The entire length of the RC drill holes are geologically logged.</li> </ul>
Sub- sampling techniques and sample preparation	<ul> <li>If core, whether cut or sawn and whether quarter, half or all core taken.</li> <li>If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.</li> <li>For all sample types, the nature, quality and appropriateness of the sample preparation technique.</li> <li>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</li> <li>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.</li> <li>Whether sample sizes are appropriate to the grain size of the material being sampled.</li> </ul>	<ul> <li>Duplicate samples are collected every 25<sup>th</sup> sample from the RC precollar chips.</li> <li>Dry RC 1m samples are riffle split to 3-4kg as drilled and dispatched to the laboratory. Any wet samples are recorded in the database as such and allowed to dry before splitting and dispatching to the laboratory.</li> <li>All samples are pulverized prior to splitting in the laboratory to ensure homogenous samples with 85% passing 75um. 200gm is extracted by spatula that is used for the 50gm charge on standard fire assays.</li> <li>RC samples submitted to the laboratory are sorted and reconciled against the submission documents. In addition to duplicates a high grade or low grade standard is included every 25<sup>th</sup> sample, a controlled blank is inserted every 100<sup>th</sup> sample. The laboratory uses barren flushes to clean their pulveriser and their own internal standards and duplicates to ensure industry best practice quality control is maintained.</li> <li>The sample size is considered appropriate for the type, style, thickness and consistency of mineralization at Coogee.</li> </ul>
Quality of assay data and laboratory tests	<ul> <li>The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.</li> <li>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.</li> <li>Nature of quality control procedures adopted (eg standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established.</li> </ul>	<ul> <li>The fire assay method is designed to measure the total gold in the sample. The technique involves standard fire assays using a 50gm sample charge with a lead flux (decomposed in the furnace). The prill is totally digested by HCl and HNO<sub>3</sub> acids before measurement of the gold determination by AAS.</li> <li>No field analyses of gold grades are completed. Quantitative analysis of the gold content and trace elements is undertaken in a controlled laboratory environment.</li> <li>Industry best practice is employed with the inclusion of duplicates and standards as discussed above, and used by Ramelius as well as the laboratory. All Ramelius standards and blanks are interrogated to ensure they lie within acceptable tolerances. Additionally, sample size, grind size and field duplicates are examined to ensure no bias to gold grades exists.</li> </ul>
Verification	• The verification of significant	Alternative Ramelius personnel have inspected     12

Criteria	JORC Code explanation	Commentary
of sampling and assaying	<ul> <li>intersections by either independent or alternative company personnel.</li> <li>The use of twinned holes.</li> <li>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</li> <li>Discuss any adjustment to assay data.</li> </ul>	<ul> <li>the RC chips in the field to verify the correlation of mineralized zones between assay results and lithology, alteration and mineralization.</li> <li>All holes are digitally logged in the field and all primary data is forwarded to Ramelius' Database Administrator (DBA) in Perth where it is imported into Datashed, a commercially available and industry accepted database software package. Assay data is electronically merged when received from the laboratory. The responsible project geologist reviews the data in the database to ensure that it is correct and has merged properly and that all the drill data collected in the field has been captured and entered into the database correctly.</li> <li>The responsible geologist makes the DBA aware of any errors and/or omissions to the database and the corrections (if required) are corrected in the database immediately.</li> <li>No adjustments or calibrations are made to any of the assay data recorded in the database.</li> <li>No new mineral resource estimate is included in this report.</li> </ul>
Location of data points	<ul> <li>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.</li> <li>Specification of the grid system used.</li> <li>Quality and adequacy of topographic control.</li> </ul>	<ul> <li>All drill hole collars are picked up using accurate RTK-GPS survey control. All down hole surveys are collected using non-magnetic gyro surveying techniques from recognized industry surveying service providers.</li> <li>All holes are picked up in MGA94 – Zone 51 grid coordinates.</li> <li>Topographic control is established from DTMs generated from mine surveyors' total station final pickups of the active Coogee open cut and surrounding landforms.</li> </ul>
Data spacing and distribution Orientation of data in relation to geological structure	<ul> <li>Data spacing for reporting of Exploration Results.</li> <li>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.</li> <li>Whether sample compositing has been applied.</li> <li>Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.</li> <li>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.</li> </ul>	<ul> <li>Deeper exploration drill holes were planned on nominal 50m x 50m partings.</li> <li>Given the detailed understanding of the target horizon within the pit where it has been intensely drilled down to 10m partings in places this broader spacing is considered adequate as a first pass to define the continuity of mineralisation, ahead of any infill as required for future resource estimation work.</li> <li>No sampling compositing has been applied within key mineralised intervals.</li> <li>The drilling is drilled to 270 degrees, being orthogonal to the strike of the target horizon. Structural logging within the Coogee pit supports the drilling direction and sampling method.</li> <li>No drilling orientation and/or sampling bias has been recognized at this time.</li> </ul>
Sample	• The measures taken to ensure sample	Sample security is integral to Ramelius'

Criteria	JORC Code explanation	Commentary
security	security.	sampling procedures. All bagged RC samples are delivered directly from the field to the assay laboratory in Kalgoorlie, whereupon the laboratory checks the physically received samples against Ramelius' sample submission/dispatch notes.
Audits or reviews	<ul> <li>The results of any audits or reviews sampling techniques and data.</li> </ul>	<ul> <li>Sampling techniques and procedures are reviewed prior to the commencement of new work programmes to ensure adequate procedures are in place to maximize the sample collection and sample quality on new projects. No external audits have been completed over Coogee to date.</li> </ul>

## Section 2 Reporting of Exploration Results

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

Criteria	JORC Code explanation	Commentary
Mineral tenement and land tenure status	<ul> <li>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.</li> <li>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.</li> </ul>	<ul> <li>The results reported in this report are on granted Mining Leases (ML) 26/477 held by Ramelius Resources Limited. The mining lease is located on pastoral leases. Heritage surveys are completed prior to any ground disturbing activities in accordance with Ramelius' responsibilities under the Aboriginal Heritage Act.</li> <li>At this time the tenements are in good standing. There are no known impediments to obtaining a licence to operate in the area.</li> </ul>
Exploration done by other parties	<ul> <li>Acknowledgment and appraisal of exploration by other parties.</li> </ul>	• Exploration by other parties has been reviewed and is used as a guide to Ramelius' exploration activities. Previous parties have completed shallow RAB, Aircore and RC drilling, geophysical data collection and interpretation. This report concerns only exploration results generated by Ramelius.
Geology	<ul> <li>Deposit type, geological setting and style of mineralisation.</li> </ul>	<ul> <li>The mineralisation at Coogee is a typical orogenic structurally controlled Archaean gold lode system, displaying anomalous copper and silver trace element geochemistry. The mineralisation is controlled by a NW to NNW trending anastomosing shear zone passing through felsic volcaniclastics and their volcanic equivalents. The Coogee deposit extends over 300m strike (where currently being mined) and dips around 30° to the southwest. High grade gold mineralization plunges around 30° to the southwest.</li> </ul>
Drill hole	A summary of all information	All the drill holes reported in this report have

Criteria	JORC Code explanation	Commentary
Information	<ul> <li>material to the understanding of the exploration results including a tabulation of the following information for all Material drill holes:</li> <li>easting and northing of the drill hole collar</li> <li>elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar</li> <li>dip and azimuth of the hole</li> <li>down hole length and interception depth</li> <li>hole length.</li> </ul> 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.	<ul> <li>the following parameters applied. All drill holes completed, including holes with no significant results (&gt;0.5 g/t Au) are reported in this announcement.</li> <li>Easting and northing are given in MGA94 – Zone 51 coordinates</li> <li>RL is AHD</li> <li>Dip is the inclination of the hole from the horizontal. Azimuth is reported in magnetic degrees as the direction the hole is drilled. MGA94 and magnetic degrees vary by &lt;1<sup>0</sup> in the project area.</li> <li>Down hole length is the distance measured along the drill hole trace. Intersection length is the thickness of an anomalous gold intersection measured along the drill hole trace.</li> <li>Hole length is the distance from the surface to the end of the hole measured along the drill hole trace.</li> <li>No results currently available from the exploration drilling are excluded from this report. Only gold grade intersections &gt;0.5g/t Au with up to 1m of internal dilution are considered significant and are reported in this report. Gold grades less than 0.5 g/t Au are not considered material due to their low grade nor are outlier plus 1000ppm copper assays without coincident gold anomalism.</li> </ul>
Data aggregation methods	<ul> <li>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.</li> <li>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.</li> <li>The assumptions used for any reporting of metal equivalent values should be clearly stated.</li> </ul>	<ul> <li>The first gold assay result received from each sample reported by the laboratory is tabled in the list of significant assays. Subsequent repeat analyses when performed by the laboratory are checked against the original to ensure repeatability of the assay results.</li> <li>Weighted average techniques are applied to determine the grade of the anomalous interval when geological intervals less than 1m have been sampled.</li> <li>Results are reported using a 0.5 g/t Au lower cut-off and may include up to 1m of internal dilution. Significant assays greater than 8 g/t Au are reported separately as contained within the broader lower grade intervals. For example the broader plus 0.5 g/t Au and is included as 4m @ 48.5 g/t Au. Where extremely high gold intersections are encountered as in this example, the highest grade sample interval (0.75m @ 150 g/t Au) is also reported. All assay</li> </ul>

Criteria	JORC Code explanation	Commentary
Relationship between mineralisatio n widths and intercept lengths	<ul> <li>These relationships are particularly important in the reporting of Exploration Results.</li> <li>If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.</li> <li>If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (eg 'down hole length, true width not known').</li> </ul>	<ul> <li>results are reported to 3 significant figures in line with the analytical precision of the laboratory techniques employed.</li> <li>No metal equivalent reporting is used or applied.</li> <li>The intersection length is measured down the length of the hole and is not usually the true width. When sufficient knowledge on the thickness of the intersection is known an estimate of the true thickness is provided.</li> <li>The geometry of the mineralization with respect to the drill holes reported in this report is well constrained from historical mining and previous drill hole intersections.</li> </ul>
Diagrams	<ul> <li>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.</li> </ul>	<ul> <li>A plan view is provided in this report to enable the reader to see the intersections relative to previous mining and previous drill hole intersections plus the current interpretation of the overall lode geometry. Given the shallow dip of the mineralization at Coogee the plan view presentation is currently considered the best 2-D representation of the known spatial extent of the mineralization intersected to date. Cross sections will be prepared for future releases when additional holes are drilled up and down dip of the new holes reported.</li> </ul>
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.	<ul> <li>All RC drill holes completed to date are reported in this report and all material intersections (&gt;0.5 g/t Au) are reported. Associated anomalous copper (&gt;0.1% Cu) is also reported.</li> </ul>
Other substantive exploration data	<ul> <li>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.</li> </ul>	<ul> <li>No other exploration data that has been collected is considered meaningful and material to this report.</li> </ul>
Further work	<ul> <li>The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling).</li> <li>Diagrams clearly highlighting the</li> </ul>	<ul> <li>Future exploration includes step out drilling away from the reported intersections to better define the extent of the mineralisation.</li> <li>The attached plan view section highlights the interpreted plunge extensions to the known</li> </ul>

Criteria	JORC Code explanation	Commentary
	areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.	mineralisation.