St Barbara LIMITED

Quarterly Report / Q2 December 2015

- **H1 FY16 production of 202,951 ounces, exceeded target**
- **FY16 guidance revised upward**
- **Accelerated debt reduction of US$33 million**
- **Safety record - lowest recorded injury rate**

Executive Summary

Operations

> **Consolidated** gold production was 91,912 ounces for the December quarter (Q1 Sep: 111,039 oz). Consolidated All-In Sustaining Cost[1] (AISC) was A$992 per ounce for the quarter (Q1 Sep: A$863 per ounce). The average realised gold price for the quarter was A$1,560 per ounce (Q1 Sep: A$1,565 per ounce).

> **Gwalia** (Western Australia) gold production for the quarter was 63,533 ounces (Q1 Sep: 72,388 oz) at AISC of A$846 per ounce (Q1 Sep A$692 per ounce). The lower production was the result of ore being mined from lower grade stopes as anticipated in the mine schedule, partially offset by an increase in ore milled. As previously announced, production from **King of the Hills** stockpiles ceased in September 2015, and the mine was sold in October 2015 (Q1 Sep: 9,112 oz).

> **Simberi** (PNG) gold production was 28,379 ounces for the quarter (Q1 Sep: 29,539 oz), comfortably in excess of the targeted 100,000 oz p.a. run rate. AISC was A$1,319 per ounce (Q1 Sep: A$1,252 per ounce), impacted by a major purchase of capital equipment in the quarter. Simberi produced 107,553 ounces of gold in calendar 2015.

Health & Safety

> The Company-wide Total Recordable Injury Frequency Rate (TRIFR), calculated as a rolling 12 month average, was a record low 3.4 to 31 December 2015 (Q1 Sep: 4.1).

> St Barbara was the overall winner, as well as the winner in three categories, in the CME (WA) Eastern Regional Council 2015 Underground Mine Emergency Response Competition, held at Kanowna Belle WA, in November 2015.

> In the previous quarter St Barbara was the winner in four categories, including Most Improved and Multi-Casualty, at the PNG National Mines Rescue Challenge held over four days in Madang, Papua New Guinea, in August 2015.

Exploration

> **Gwalia (Leonora) WA** A program directed at extensions to the Gwalia lode system approximately 400m below current underground mine workings has continued with the completion of parent hole GWDD17 to a downhole depth of 2,155m and the subsequent drilling of daughter hole GWDD17A to 2,140m. Additionally, four daughter holes were completed from parent hole GWDD13 being GWDD13I-J-K-L. The Gwalia Mine Sequence was intersected in each drill hole and evaluated the lode system over an approximate strike length of 200m, between 1,800 to 2,000 metres below surface. Details are set out in Figures 1.0, 1.1 and Table 1 in the Exploration Figures and Tables appendix. Further drilling is in progress targeting extensions to the lode system.

> **Centenary Project (Leonora) WA** An anomalous nickel mineralisation has been identified in a diamond drill hole (CNRD0004) which targeted an electromagnetic (EM) anomaly located approximately 60 km north of Leonora, announced during April 2015. A second phase of work to further evaluate this target, as well as other base metal opportunities in the Centenary Project area, is expected to commence in the March 2016 quarter.

> **Pinjin Project (Yilgarn) WA** An aircore drilling program of up to 25,000 metres to test bedrock geochemical and geophysical targets within the Pinjin project is expected to commence late in the March 2016 quarter.

> **Simberi PNG** Drilling at Pigibo North and Patan on the Simberi Mine Lease (PNG) targeting oxide mineralisation was completed during the quarter. Encouraging results were returned (all intercepts downhole, details in Figure 4.3 and Table 3) including:

Patan

> SDH348: 5m @ 14.1 g/t Au from 15m

> SDH349: 14m @ 4.1 g/t Au from 22m

> SDH352: 16m @ 1.7 g/t Au from 21m

> **Big Tabar Island PNG** A program of detailed creek mapping and channel sampling was completed at Banesa Au-Cu porphyry prospect (EL609) during the December quarter. Significant trench results were returned (details in Figure 4.5 and Table 3) including:

> TABTR174: 57m @ 1.4 g/t Au and 0.1% Cu, including 25m @ 1.8 g/t Au

1 Non-IFRS measure, refer page 12

Finance (unaudited)

> US dollar denominated debt was reduced by US$33 million during the quarter to US$216 million at 31 December 2015 (Q1 Sep: US$249 million). US$109 million of debt has been repaid since 1 June 2015 and debt repayment remains the preferred use for the Company's strong cash flows. At 31 December 2015, interest bearing liabilities totalled A$299 million (Q1 Sep: A$358 million).

> Cash contribution[1] from operations for the quarter was A$57 million, (Q1 Sep: A$80 million) with the Gwalia result lower than the previous quarter because of the mining schedule moving through lower grade areas and the Simberi result affected by higher capital expenditure in the quarter. Cash at bank as at 31 December 2015 was A$100 million[2] (Q1 Sep: A$115 million) after repayment of debt and financing costs in the quarter of A$58 million (Q1 Sep: A$34 million).

Outlook

> Guidance for FY16 was revised upward (as announced on 8 January 2016) due to above-target production in the first half as follows:

  > Forecast Gwalia (Leonora) gold production of between 245,000 and 260,000 ounces (previously 230,000 to 250,000 ounces) at an AISC of between A$840 and A$900 per ounce (previously between A$875 and A$940 per ounce), with capex unchanged at between A$30 and A$35 million.

  > Forecast Simberi gold production of between 100,000 and 110,000 ounces (previously 90,000 to 110,000 ounces) at an AISC of between A$1,350 and A$1,430 per ounce (previously A$1,275 to A$1,400 per ounce), with capex of between A$10 and A$12 million (previously between A$8 and A$12 million).

  > Forecast exploration expenditure of A$15 million (previously A$10 million).

Bob Vassie
Managing Director and CEO
21 January 2016

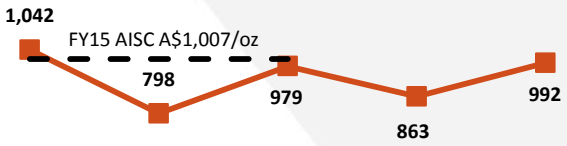
1 Non-IFRS measure, refer reconciliation of cash movements on page 11
2 Excluding A$1 million restricted cash

St Barbara Gold Production & Guidance

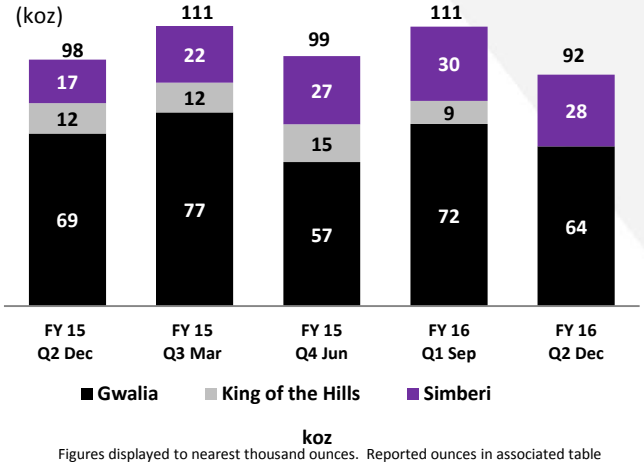
Production Summary Consolidated		Q3 Mar FY15	Q4 Jun FY15	Year FY15	Q1 Sep FY16	Q2 Dec FY16	Guidance FY16 [3]
Production							
Gwalia	oz	76,954	57,208	248,142	72,388	63,533	245 to 260 koz
							(previously 230 to 250 koz)
King of the Hills	oz	11,836	15,014	49,677	9,112	-[5]	9 koz[4]
Simberi	oz	22,498	27,137	79,568	29,539	28,379	100 to 110 koz
							(previously 90 to 110 koz)
Consolidated	oz	**111,288**	**99,359**	**377,387**	**111,039**	**91,912**	**354 to 379 koz**
							(previously 329 to 369 koz)
Mined Grade							**Reserve grade [2]**
Gwalia	g/t	9.7	8.6	8.9	9.7	7.9	9.4
King of the Hills	g/t	4.1	4.5	4.2	n/a	n/a[5]	n/a
Simberi	g/t	1.38	1.28	1.23	1.22	1.22	1.3
Total Cash Operating Costs[1]							
Gwalia	$/oz	532	729	642	553	665	n/a
King of the Hills	$/oz	1,177	1,095	1,112	893	-	n/a
Simberi	$/oz	1,193	1,035	1,336	1,119	1,098	n/a
Consolidated	$/oz	**734**	**868**	**850**	**731**	**799**	
All-In Sustaining Cost[1]							
Gwalia	$/oz	645	860	841	692	846	840 to 900
							(previously 875 to 940)
King of the Hills	$/oz	812	1,106	1,103	964	-	-
Simberi	$/oz	1,310	1,149	1,464	1,252	1,319	1,350 to 1,430
							(previously 1,275 to 1,400)
Consolidated	$/oz	**798**	**979**	**1,007**	**863**	**992**	**990 to 1,060**
							(previously 995 to 1,070)

[1] Non-IFRS measure, refer page 12.
[2] Ore Reserve grade at 30 June 2015, refer Ore Reserve and Mineral Resources Statement released 25 August 2015.
[3] FY16 guidance issued in the June 2015 Quarterly Report (released 21 July 2015) and revised on 8 January 2016 and in this report.
[4] Stockpiled as at 30 June 2015.
[5] King of the Hills ceased mining in April 2015 and ceased processing in September 2015. It was sold in October 2015 (refer ASX announcement 16 October 2015).

AISC (Consolidated)
(A$/oz)

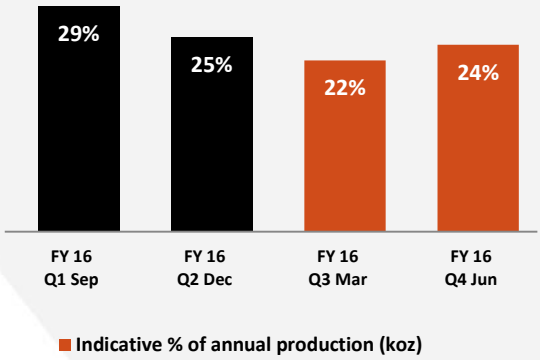


Gold Production
(koz)

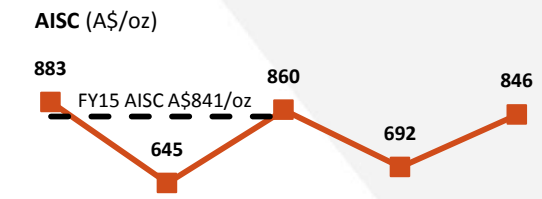


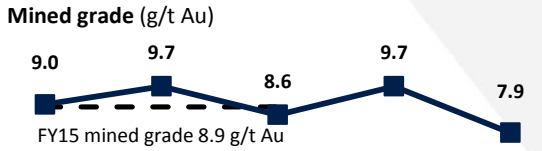
Figures displayed to nearest thousand ounces. Reported ounces in associated table

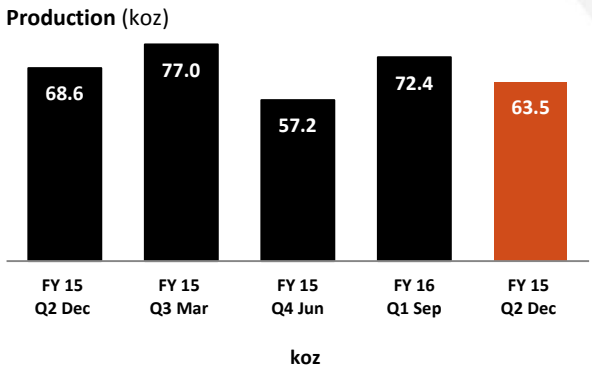
FY16 Production
Indicative Quarterly Guidance Profile



Gwalia, Leonora, WA







Operations

> Gwalia produced 63,533 ounces of gold in the December quarter. The decrease in production from the September quarter was the result of the stopes mined in the quarter being of overall lower grade, as anticipated in the mine schedule, partially offset by an increase in ore milled. The result was better than anticipated, leading to the guidance upgrade released to the ASX on 8 January 2016.

> The grade cycle that results from the 'centre out' mining method can be seen in the results over the last five quarters (with alternate quarters of higher and lower production), as illustrated in the production and cost graphics above.

> Mining continued to perform well, including the ongoing implementation of recent innovations such as underground waste storage and an ore pass system, with 242 kt of ore mined for the quarter.

> The mined ore grade for the quarter was 7.9 g/t Au, compared with the Ore Reserve grade of 9.4 g/t Au[1]. This was higher than anticipated in the mine schedule, and reflects the variability in grade between different stopes in the mine sequence.

> The lower grade was largely offset by an increase in ore milled for the quarter to 267 kt, including the processing of stockpiles from the preceding quarter. Ore containing an estimated 1,000 ounces of gold was stockpiled at the end of the quarter, down from an estimated 5,500 ounces at the start of the quarter.

> All In Sustaining Cost (AISC) was A$846 per ounce for the quarter, an increase on the previous quarter primarily due to the lower grade mined and consequent lower production for the quarter.

West Lode Drilling Program

> West Lode (Figure 2.0) constitutes one of the four major lode structures identified within the Gwalia Mine Sequence and is located approximately 80m to the west of South West Branch. South Gwalia Series, which is in close proximity to West Lode, has also generated some encouraging intercepts in this drilling program.

> Drilling results have generated intercepts of such encouraging grade and thickness that consequently studies to assess the options for exploiting the lode, possibly in association with a materials handling solution, have begun. It is expected that West Lode will add to reserves.

> Further drilling is planned to investigate extensions of the lode system below 1,800 metres below surface.

Gwalia Growth Projects – Materials Handling Study

> During the quarter the Company performed conceptual studies on potential materials handling systems for deeper mining. These studies include assessing blind and raise-bore shafts with skip hoisting, a shaft with vertical conveying, new ventilation shafts to facilitate continued truck haulage and also slurry pumping to surface.

> Management is currently reviewing the progress results of these studies and recent drilling results and will be able to provide an update in the March quarter. The review will inform the selection of options for detailed study, which will target provision of information necessary for an investment decision in Q2 December FY17.

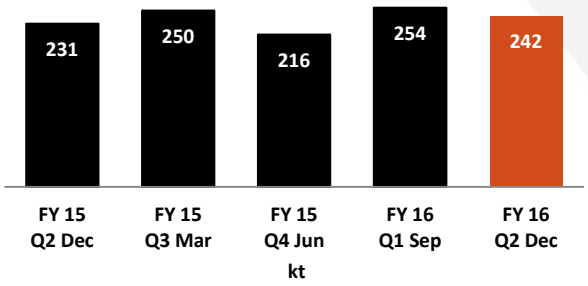
1 Ore Reserve grade at 30 June 2015, refer Ore reserves and Mineral Resources Statements released 25 August 2015.

Outlook

> FY16 guidance has been revised due to above-target production in the first half as follows:

- Production of between 245,000 ounces and 260,000 ounces (previously 230,000 to 250,000 ounces)
- AISC of between A$840 and A$900 per ounce (previously between A$875 and A$940 per ounce)
- Capital expenditure of between A$30 and A$35 million (unchanged).

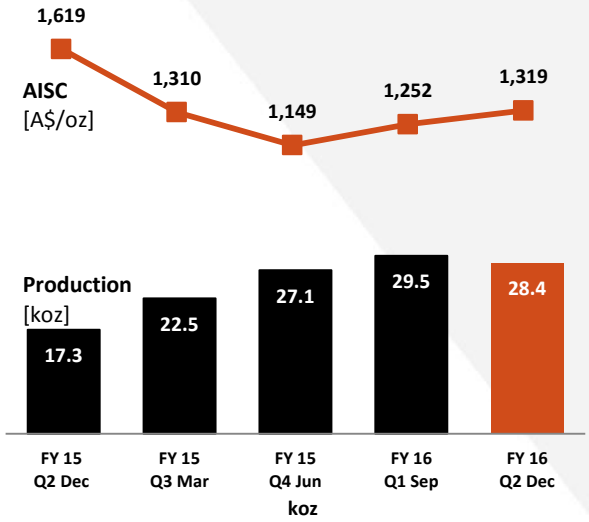
Gwalia underground ore mined



Production Summary Gwalia		**Q4 Jun FY15**	**Q1 Sep FY16**	**Q2 Dec FY16**
Underground ore mined	kt	216	254	242
Grade	g/t	8.6	9.7	7.9
Low grade development ore & stockpiles milled	kt	7	2	8
Grade	g/t	1.9	2.6	3.3
Ore milled	kt	225	241	267
Grade [1]	g/t	8.2	9.8	7.7
Recovery	%	96	96	96
Gold production	**oz**	**57,208**	**72,388**	**63,533**
All-In Sustaining Cost [2]		$ per ounce		
Mining		469	356	410
Processing		99	121	123
Site services		65	52	51
Stripping and ore inventory adjustments		58	(11)	42
		691	**518**	**626**
By-product credits		(2)	(3)	(2)
Third party refining & transport		1	1	1
Royalties		39	37	40
Total cash operating costs		**729**	**553**	**665**
less operating development		(102)	(45)	(52)
Adjusted cash operating cost		627	508	613
Corporate and administration		36	40	48
Corporate royalty		24	23	23
Rehabilitation		2	3	3
On-site exploration		-	-	-
Capitalised mine & op development		145	101	91
Sustaining capital expenditure		26	17	19
All-In Sustaining Cost (AISC)		**860**	**692**	**846**

[1] Includes Gwalia mineralised waste
[2] Non-IFRS measure, refer page 12

Simberi, Papua New Guinea



Production Summary Simberi		Q4 Jun FY15	Q1 Sep FY16	Q2 Dec FY16
Total ore & waste mined	kt	1,882	2,606	2,417
Ore mined	kt	725	896	876
Grade	g/t	1.28	1.22	1.22
Ore milled	kt	768	859	832
Grade	g/t	1.3	1.3	1.3
Recovery	%	86	84	84
Gold production	**oz**	**27,137**	**29,539**	**28,379**
All-In Sustaining Cost [1]			$ per ounce	
Mining		345	351	352
Processing		394	448	480
Site services		245	273	224
Stripping and ore inventory adjustments		-	-	-
		984	**1,072**	**1,056**
By-product credits		-	-	-
Third party refining & transport		14	10	10
Royalties		37	37	32
Total cash operating costs		**1,035**	**1,119**	**1,098**
Corporate and administration		36	40	48
Corporate royalty		-	-	-
Rehabilitation		17	14	15
On-site exploration		-	-	-
Capitalised mine & op development		-	-	-
Sustaining capital expenditure		61	79	158
All-In Sustaining Cost (AISC)		**1,149**	**1,252**	**1,319**

[1] Non-IFRS measure, refer page 12

Operations

> Simberi produced 28,379 ounces of gold during the quarter and comfortably exceeded the 100,000 oz p.a. target run rate for the third consecutive quarter.

> Simberi produced 107,553 ounces of gold for calendar 2015, including 57,918 ounces of gold for the first half of FY16.

> The total volume of material and ore mined decreased slightly to 2.4 Mt, due to longer hauls from the pits in use. During December additional haul trucks and excavators have been purchased and are due to arrive onsite during Q3 March 2016. These are expected to increase mining rates.

> AISC for the quarter was A$1,319 per ounce (Q1 Sep: A$1,252/oz), whilst the underlying 'total cash operating costs' per ounce decreased by 2%, indicating strong ongoing cost control performance. Simberi costs are denominated approximately in US Dollars (40%), Papua New Guinea Kina (40%) and Australian Dollars (20%).

> The All-In Sustaining Cost increase is primarily due to higher capital expenditure during the quarter, relating to the investment of US$2 million in two low hour excavators. These excavators match two existing excavators and will allow older and smaller equipment to be stood down which will create a more productive, lower cost loading fleet. The excavators are due to arrive in February along with four low hour mining trucks (purchased in the March quarter).

> There is confidence that Simberi can improve further as a result of:

  > a number of operational enhancements planned for implementation in the March Quarter 2016 for the ore delivery system (incorporating the aerial rope conveyor), including installation of redesigned chutes and air-blades

  > mining performance should improve with the expected arrival of new fleet (mentioned above) in February 2016.

Outlook

> FY16 has been revised due to above-target production in the first half as follows:

  > production of between 100,000 and 110,000 ounces (previously between 90,000 and 110,000 ounces)

  > AISC of between A$1,350 and A$1,430 per ounce (previously A$1,275 to A$1,400 per ounce), the increase in AISC guidance for Simberi is impacted by a weaker AUD/USD exchange rate assumption for the remainder of FY16.

  > Capex of between A$10 and A$12 million (previously between A$8 and A$12 million).

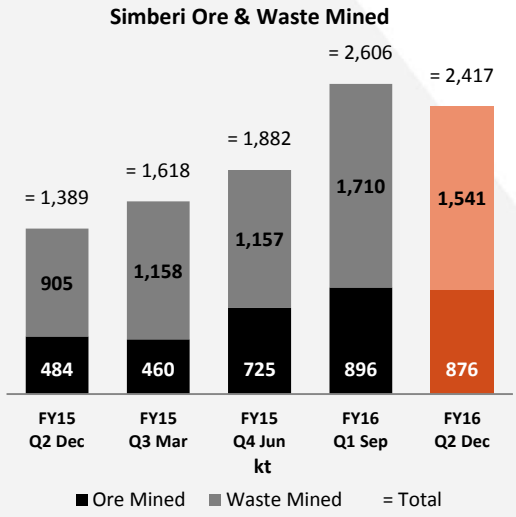
Simberi oxide life of mine / sulphide project

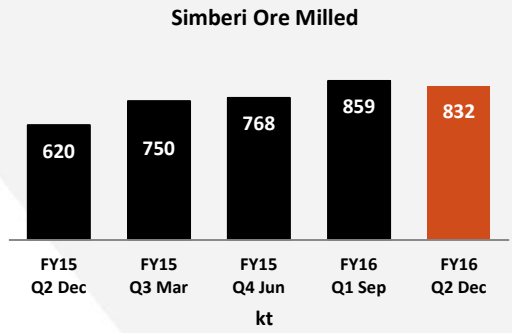
> Stated oxide and sulphide reserves indicate a potential long life operation in excess of 15 years.

> The value optimised oxide mine plan has approximately 3.5 years remaining.

> Oxide reserves are within the pit wall pushbacks of the deeper sulphide pits, meaning that a value optimised mine plan needs to include a phased cut-over period between oxide and sulphide mining when both can be processed.

> The Simberi Sulphide prefeasibility study (PFS) of the, which will also inform oxide options, was further progressed during the quarter. Ongoing work includes developing the optimised mine and processing plans, with subsequent evaluation of project economics. The PFS is due to be completed in the March 2016 quarter.





Exploration

Gwalia Deep Drilling Program, Leonora WA

> Resource extension drilling at Gwalia has continued with the objective of providing the required certainty to extend the Gwalia resource and to develop the case for mining below the current base of reserves at of 1,800 metres below surface (mbs).

> Parent hole GWDD17 was completed at a downhole depth of 2,155m and a first daughter hole GWDD17A at a downhole depth of 2,140m. Parent hole GWDD13 was re-opened and utilised for four further daughter holes, I, J, K & L, that were completed to downhole depths of 2,272m, 2,257m, 2,262m and 2,293m respectively.

> All six drill holes have successfully intersected the mining sequence for widths of between 50 and 100m, intersecting variously either all or some of the mineralised veining interpreted to be extensions of Main Lode South West Branch, South Gwalia Series and West Lode. Results are set out in Figures 1.0, 1.1 and Table 1.

> Daughter hole GWDD17B had obtained a downhole depth of 2,248m at the end of the quarter and is expected to be completed in January.

> Recent intercepts of the extension to the current source of high grade ore, 'South West Branch', are similar to those encountered in shallower parts of the deposit (1,100 – 1,200 mbs) but significantly thinner than at the current depths being mined, and in the existing reserve.

> Drilling results thus far are still limited in coverage and not capable of supporting a generalised conclusion. This phase of the drilling program is expected to extend into the September quarter of 2016, to properly delineate an Indicated Resource, and a program to test the extensions down to 2,200 mbs is being developed.

> It is also expected that the drilling program will create new reserves, immediately below the base of existing reserves, based on existing trucking methods. Studies will continue to investigate alternative materials handling or ventilation solutions to continue deeper.

Centenary Project, Leonora WA

> The Centenary project is located approximately 60 km north of Leonora, near the Jaguar and Bentley operations of Independence Group.

> As previously announced St Barbara has completed a drilling program and downhole electromagnetic (EM) survey work on four target areas, three of which target copper-zinc-silver volcanogenic massive sulphide systems within E37-916 while a fourth focussed on a highly conductive anomaly within E37-917, coincident with nickel geochemistry.

> Previously unreported results from the drilling of a rotary mud/ diamond hole (CNRD004) directed at the EM anomaly in E37-917 returned elevated nickel geochemistry within a shallow interval of weathered ultramafics. The source of the EM anomaly is yet to be explained. The following intercept was recorded (refer Table 2):

CNRD004: 7m @ 5,651ppm Ni from 58 m

> A second phase of work is expected to commence during the March quarter of 2016.

Pinjin Project, Yilgarn WA

> Exploration continued on the Pinjin project within the Yilgarn Province, WA. The Pinjin Project is located 150km northeast of Kalgoorlie, comprising a large tenement package of 20 exploration licences (1,358 km^2)(Figure 3.1).

> Two reconnaissance field visits were conducted during the quarter and necessary approvals obtained. A significant aircore drilling program (of up to 25,000 metres) targeting bedrock geochemical and geophysical targets is expected to commence late in the March 2016 quarter and continue through much of the June 2016 quarter.

Simberi, Tatau & Tabar Islands, Papua New Guinea (ML 136 and EL 609)

> Exploration continued on Simberi ML136 and EL609 at Western Simberi Island and Big Tabar Island (Figures 4.0 and 4.1).

> On Simberi Island (Figure 4.0), the exploration program continued to focus on identifying additional near-mine higher grade oxide resources as potential ore feed sources to extend oxide mine life.

> 59 bedrock jackhammer samples were collected from Bekou South following up on an historical gold-in-soil anomaly (Figure 4.0). Results are pending. A single trench (SIMTR953) was completed for 35 metres and 7 samples within ML136 at Pigibo North. Results are highlighted in Figure 4.2.

Pigibo North:

> Seven diamond drill holes (SDH341 to SDH347) were completed at Pigibo North in October 2015 for a total of 445.4m (Figure 4.2 and Table 3). The overall diamond drill program comprised 13 holes (SDH335 to SDH347) for 779.3 metres. Encouraging results were returned including (all intercepts down-hole, details in Table 3):

> SDH336: 28m @ 0.9 g/t Au from 14m

> SDH338: 9m @ 1.4 g/t Au from 1m

> SDH342: 22m @ 0.7 g/t Au from 3m

> SDH347: 18m @ 1.0 g/t Au from 0m

Patan:

> Eight diamond drill holes (SDH348 to SDH355) were completed at Patan in the December Quarter for a total of 503.5m (Figure 4.3 and Table 3). Encouraging results were returned including (all intercepts down-hole):

> SDH348: 5m @ 14.1 g/t Au from 15m, including
1m @ 50.9 g/t Au from 17m

> SDH349: 14m @ 4.1 g/t Au from 22m, including
3m @ 9.0 g/t Au from 29m, and
1m @ 16.9 g/t Au from 31m, and
1m @ 14.9 g/t Au from 34m

> SDH352: 16m @ 1.7 g/t Au from 21m

West Simberi:

> Surface sampling continued on West Simberi Island (EL609) during the December quarter. Ridge and spur soil samples (n= 177) followed up previous anomalous gold samples in stream sediment (Figure 4.4). Maximum assay results returned from the recent soil samples was 15 ppb Au.

Big Tabar Island:

> A major program of detailed creek mapping, trench mapping and channel sampling was completed at Banesa Au-Cu prospect (EL609). During the December quarter, 19 creek channel and trenches (TABTR168 to TABTR186) were completed for 2,862 metres and 573 samples. To date, a total of 124 creek channel and trenches (TABTR064 to TABTR186) for 6,977 metres and 1,388 samples were collected at Banesa. Au and Cu assay results were received for trenches TABTR168 to TABTR176. Significant trench sampling results are highlighted in Figure 4.5 and include:

Banesa:

> TABTR168: 20m @ 1.1 g/t Au and 0.3% Cu, and
30m @ 1.2 g/t Au

> TABTR171: 30m @ 1.2 g/t Au and 0.1% Cu, including
20m @ 1.7 g/t Au

> TABTR174: 57m @ 1.4 g/t Au and 0.1% Cu, including
25m @ 1.8 g/t Au

Expenditure (unaudited)

> Expenditure on mineral exploration for the December 2015 quarter is shown below:

	Q2 Dec 2015	
Australia	A$0.4 million	(expensed)
Pacific	A$1.3 million	(expensed)
Gwalia Deep Drilling	A$3.6 million	(capitalised)
Total	A$5.3 million	

March 2016 Quarter

> Exploration in Q3 March 2016 will focus on:

> Continuing the Gwalia Deeps drilling program;

> Phase 2 of drilling, sampling and ground EM surveys at the Centenary Project;

> Preparing for and commencing a major aircore drilling program of up to 25,000 metres at Pinjin;

> Targeting near mine oxide potential within ML136 on Simberi;

> Continuing reconnaissance ridge and spur soil sampling on West Simberi (EL609);

> Subject to access, trenching on southwest Tatau Island targeting higher grade oxide potential;

> Conduct additional follow-up trenching at Banesa Au-Cu prospect on Big Tabar Island;

> Subject to access, commencing mapping and surface sampling at Fotombar prospect on Big Tabar Island.

> The map below shows current and planned target areas for Q3 March 2016.

Revised exploration expenditure guidance for FY16

> Guidance on Exploration expenditure for FY16, is revised as follows:

  > A$15 million, approximately 70% Australia and 30% Pacific (previously A$10 million, approximately 55% in Australia and 45% in the Pacific).

  > The increase is primarily due to accelerating the Gwalia deep drilling program to support the materials handling study and allow an investment decision on a timely basis.

Health & Safety

> The Company-wide Total Recordable Injury Frequency Rate (TRIFR), calculated as a rolling 12 month average, decreased from 4.1 at 30 September 2015 to a record low 3.4 for the twelve months ended 31 December 2015.

> St Barbara was the overall winner, as well as winner in three categories, in the CME (WA) Eastern Regional Council 2015 Underground Mine Emergency Response Competition, held at Kanowna Belle WA, in November 2015.

> In the previous quarter St Barbara were winners in four categories, including Most Improved and Multi-Casualty, at the PNG National Mines Rescue Challenge held over four days in Madang, Papua New Guinea, in August 2015.

Financials (unaudited)

> 89,050 ounces of gold were sold in the December quarter, at an average realised gold price of A$1,560 per ounce (Q1 Sep: 109,776 ounces at A$1,565 per ounce).

> Cash at bank at 31 December 2015 was $100 million[1] after total payments during the quarter of A$58 million for the repurchase of US Notes and payment of bi-annual interest and Red Kite interest and principal repayments noted below:

  > During the December quarter, the Company repurchased US$3 million in aggregate principal of its US Senior Secured Notes at a 4% discount to par value. St Barbara has now repurchased a cumulative US$70 million (28%) in aggregate principal of the original US$250 million of Notes issued by St Barbara in March 2013 at discounts of between 4% and 7%. US$180 million of the Notes were on issue at the end of the December quarter.

  > Following the first US$9 million quarterly amortisation repayment against the Red Kite debt facility during the September 2015 quarter, a further US$30 million principal was repaid during the December quarter. The balance of the Red Kite facility at 31 December 2015 was US$36 million.

> Cash movements for the December 2015 quarter are summarised in the following table:

Cash movements & balance A$M (unaudited)	**Q4 Jun FY15**	**Q1 Sep FY16**	**Q2 Dec FY16**
Leonora - operating cash flow [2]	59	68	52
Simberi - operating cash flow [2]	10	12	5
Gold Ridge[3]	-	(1)	(1)
Rehabilitation , land management & corporate capex	(1)	(2)	(1)
Corporate costs [4]	(4)	(4)	(4)
Corporate royalties	(2)	(2)	(2)
Exploration [5]	(3)	(2)	(5)
Other project costs[7]	(2)	-	-
Working capital movement	(3)	3	(1)
Cash flows before finance costs	54	72	43
Net interest and finance costs	(18)	(4)	(13)
US debt repayment	(67)	(30)	(45)
Net movement for quarter	(31)	38	(15)
Cash balance at start of quarter	108	77	115
Cash balance at end of quarter[6]	**77**	**115**	**100**

> Total interest bearing liabilities at 31 December 2015 of A$299 million (30 Sep 2015: A$358 million) included US$180 million Senior secured notes and US$36 million Red Kite facility, with the balance comprised of A$3 million of lease liabilities. A$/US$ exchange rate at 31 Dec 2015 was 0.7306[8] (30 September 2015: 0.7010).

> The Company manages exposure to the US dollar denominated debt using US dollar revenue from gold sales.

> At 31 December 2015, there were 50,100 ounces of gold forward contracts at a strike price of A$1,600 per ounce to be delivered between January 2016 and June 2016. These gold forward contracts were established to secure a stable cash margin on Simberi's forecast FY16 gold production.

1. Excluding A$1 million restricted cash

2. Net of sustaining capex
3. Q2 Dec cash flow includes final payment for water treatment plant
4. Includes corporate redundancy payments and restructuring consulting fees incurred in relevant quarters
5. Includes Gwalia deep drilling
6. Excluding restricted cash (Q4: A$1M, Q1: A$2M, Q2: A$1M)
7. Procurement cost reduction project
8. www.rba.gov.au

Senior Secured Notes	US$M
> Issued March 2013	250
> Repurchased Q4 Jun 2015	(54)
> Repurchased Q1 Sep 2015	(13)
> Repurchased Q2 Dec 2015	(3)
> Balance remaining at 31 Dec 2015	180
> Coupon	8.875% p.a.
> Redemption date	15 April 2018
> S&P rating	B-
> Moody's rating	Caa1

Corporate

Share Capital

Issued shares	
Opening balance 30 September 2015	**495,102,525**
Issued	Nil
Closing balance 31 December 2015	**495,102,525**
Unlisted employee rights	
Opening balance 30 September 2015	**20,059,671**
Issued 10 December 2015 (FY16 LTI)	3,974,617
Lapsed	Nil
Closing balance 31 December 2015	**24,034,288**

ASX & ADR

The Company's shares are listed on ASX (ASX:SBM) and through American Depositary Receipts (ADR OTC: STBMY) traded in the USA.

Scheduled Future Reporting

Date	Report
23 February	Half Year Financial Report
Late April	March 2016 Quarterly Report

[Dates are tentative and subject to change]

Non-IFRS Measures

> The Company supplements its financial information reporting determined under International Financial Reporting Standards (IFRS) with certain non-IFRS financial measures, including cash operating costs and All-In Sustaining Cost. We believe that these measures provide additional meaningful information to assist management, investors and analysts in understanding the financial results and assessing our prospects for future performance.

> Cash Operating Costs are calculated according to common mining industry practice using The Gold Institute (USA) Production Cost Standard (1999 revision).

> All-In Sustaining Cost (AISC) is based on Cash Operating Costs, and adds items relevant to sustaining production. It includes some, but not all, of the components identified in World Gold Council's Guidance Note on Non-GAAP Metrics - All-In Sustaining Costs and All-In Costs (June 2013).

  > AISC is calculated on gold production in the quarter.

  > For underground mines, amortisation of operating development is adjusted from "Total Cash Operating Costs" in order to avoid duplication with cash expended on operating development in the period contained within the "Mine & Operating Development" line item.

  > Rehabilitation is calculated as the amortisation of the rehabilitation provision on a straight-line basis over the estimated life of mine.

Competent Persons Statement

Exploration Results

> The information in this report that relates to Exploration Results for Simberi and Pinjin is based on information compiled by Dr Roger Mustard, who is a Member of The Australasian Institute of Mining and Metallurgy. Dr Mustard is a full-time employee of St Barbara and 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 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves'. Dr Mustard consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

> The information in this report that relates to Exploration Results for Gwalia and the Leonora region is based on information compiled by Mr Robert Love, who is a Fellow of The Australasian Institute of Mining and Metallurgy. Mr Love is a full-time employee of St Barbara and 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 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves'. Mr Love consents to the

inclusion in the report of the matters based on his information in the form and context in which it appears.

Mineral Resource and Ore Reserve Estimates

> The information in this report that relates to Mineral Resources or Ore Reserves is extracted from the report titled 'Ore Reserves and Mineral Resources Statements 30 June 2015' released to the Australian Securities Exchange (ASX) on 25 August 2015 and available to view at www.stbarbara.com.au and for which Competent Persons' consents were obtained. Each Competent Person's consent remain in place for subsequent releases by the Company of the same information in the same form and context, until the consent is withdrawn or replaced by a subsequent report and accompanying consent.

> The Company confirms that it is not aware of any new information or data that materially affects the information included in the original ASX announcement released on 25 August 2015 and, in the case of estimates of Mineral Resources or Ore Reserves, that all material assumptions and technical parameters underpinning the estimates in the original ASX announcement continue to apply and have not materially changed. The Company confirms that the form and context in which the Competent Person's findings are presented have not been materially modified from the original ASX announcement.

> Competent Persons Dr Mustard and Mr John de Vries (prior to his resignation from St Barbara in July 2015) are entitled to participate in St Barbara's long term incentive plan, details of which are most recently included in the 2015 Annual Report and Notice of 2015 Annual General Meeting released to the ASX on 20 October 2015. In 2012 and 2013 increase in Ore Reserves was one of the performance measures under that plan.

> Full details are contained in the ASX release dated 25 August 2015 'Ore Reserves and Mineral Resources Statements 30 June 2015' available at www.stbarbara.com.au.

Corporate Directory

St Barbara Limited ABN 36 009 165 066

Board of Directors

Tim Netscher ..... Non-Executive Chairman

Bob Vassie .....Managing Director & CEO

Kerry Gleeson .....Non-Executive Director

David Moroney .....Non-Executive Director

Executives

Bob Vassie .....Managing Director & CEO

Garth Campbell-Cowan .....Chief Financial Officer

Registered Office

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Facsimile	+61 3 8660 1999
Email	info@stbarbara.com.au
Website	www.stbarbara.com.au

Australian Securities Exchange (ASX) Listing code "SBM"

American Depositary Receipts (ADR OTC code "STBMY") through BNY Mellon, www.adrbnymellon.com/dr_profile.jsp?cusip=852278100

Financial figures are in Australian dollars (unless otherwise noted).

Shareholder Enquiries

Computershare Investor Services Pty Ltd

GPO Box 2975

Melbourne Victoria 3001 Australia

Telephone (within Australia)	1300 653 935
Telephone (international)	+61 3 9415 4356
Facsimile	+61 3 9473 2500

www-au.computershare.com/investor

American Depositary Receipt enquires:

BNY Mellon Depositary Receipts

www.bnymellon.com/shareowner

Investor Relations Contact

Rowan Cole, Company Secretary + 61 3 8660 1900

Substantial Shareholders

	% of Holdings[1]
Hunter Hall Investment Management Ltd	15.0%
M&G Investment Management Ltd	11.5%
Franklin Resources Inc	5.6%

1. As notified by the substantial shareholders to 18 January 2016

Exploration Figures and Tables

Figure 1.0: Leonora: Gwalia Long Section (looking west)

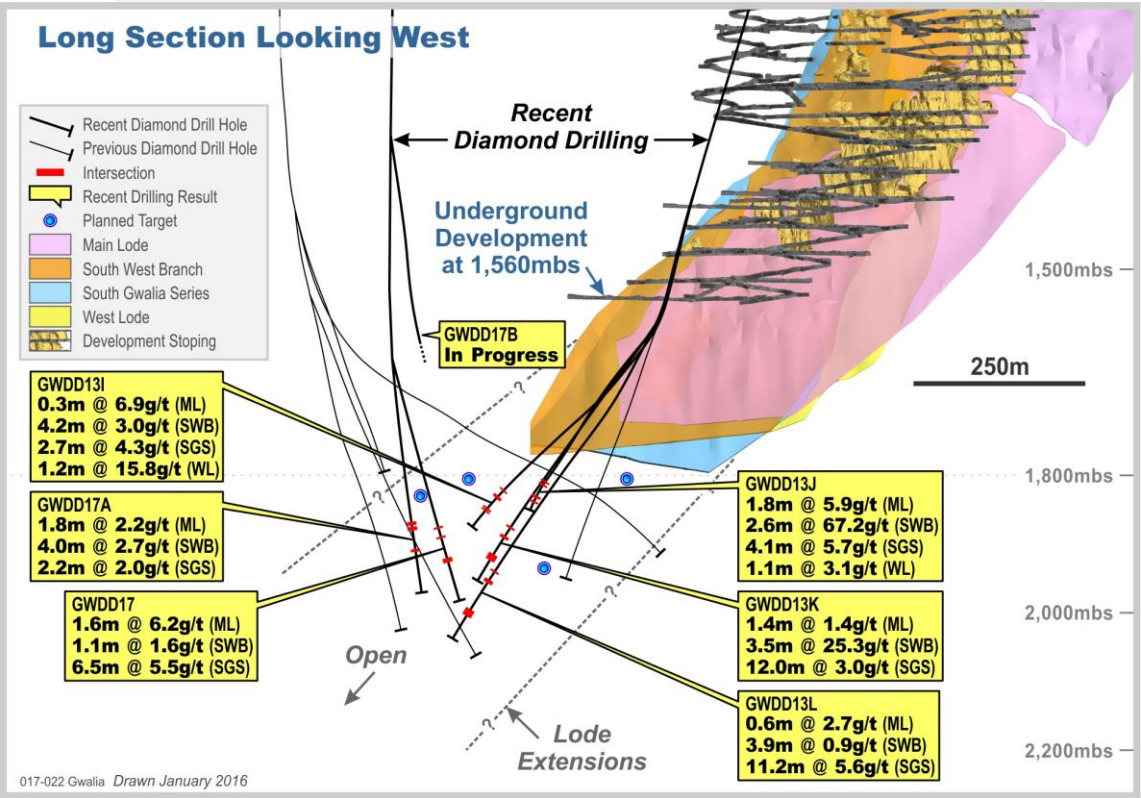

Figure 1.1: Leonora: Gwalia Cross Section (looking north)

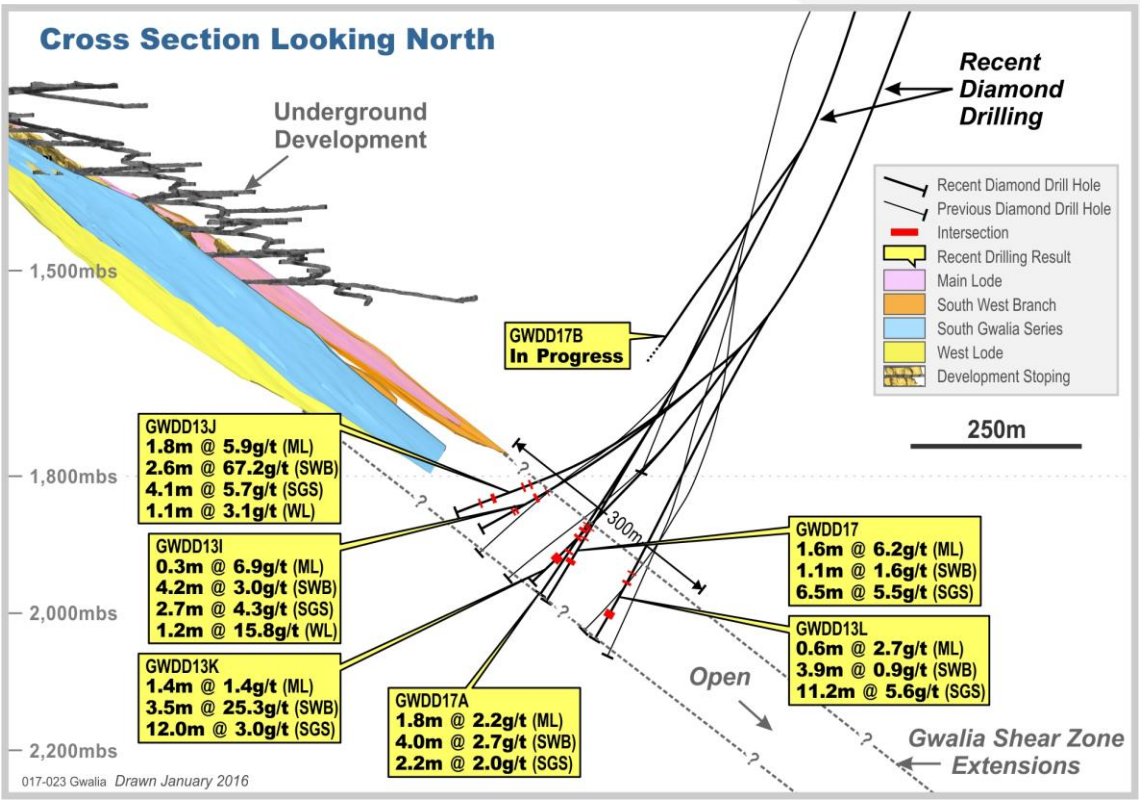

Figure 2.0: West Lode Long Section (looking west)

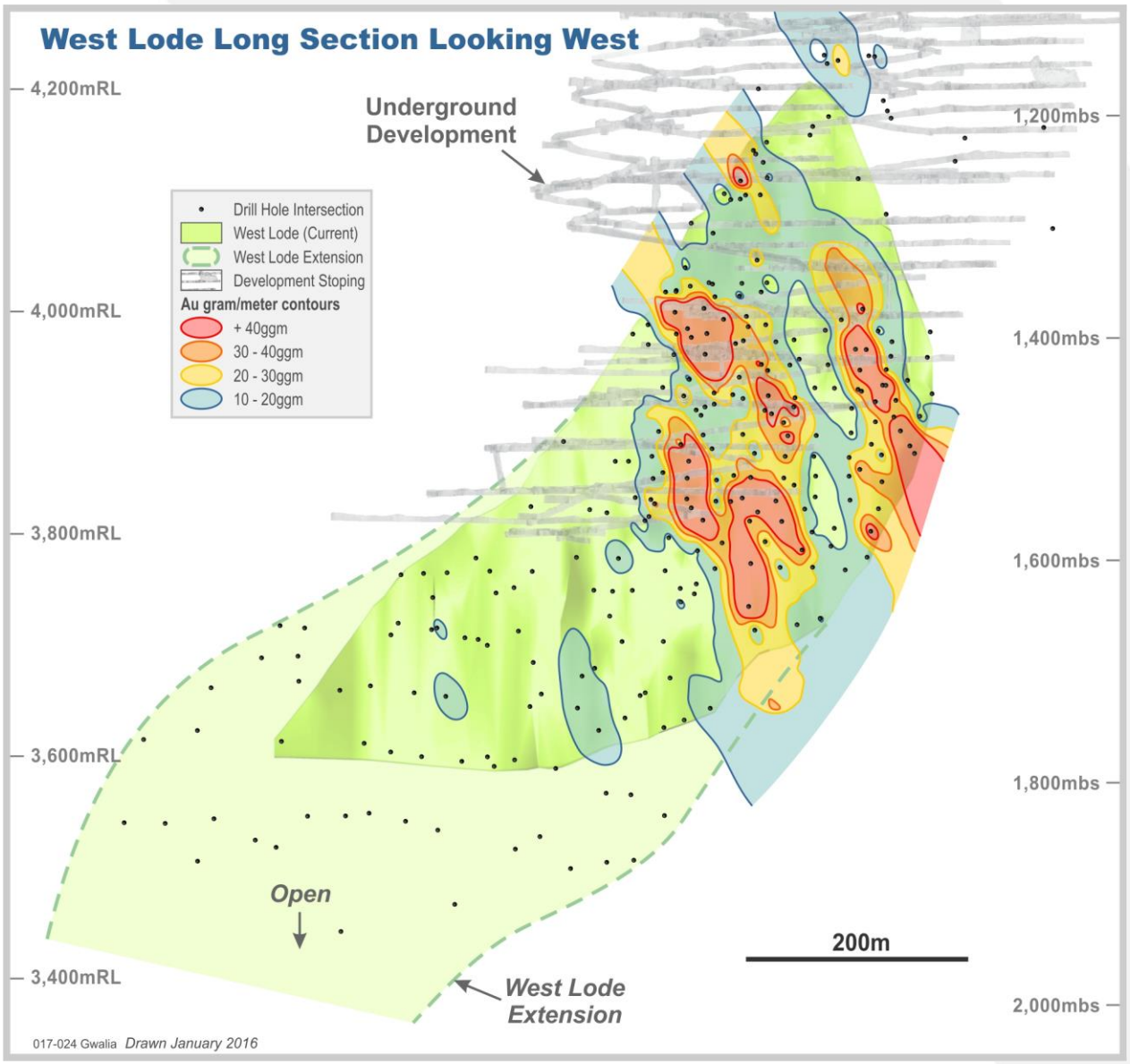

Figure 3.0: Leonora: Centenary Project – Drilling

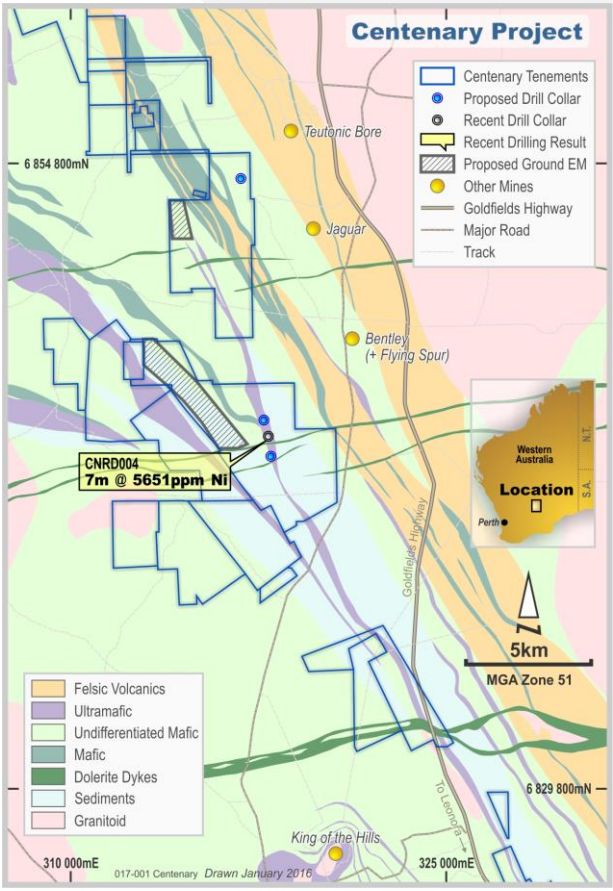

Figure 3.1: Pinjin: Project Location Map

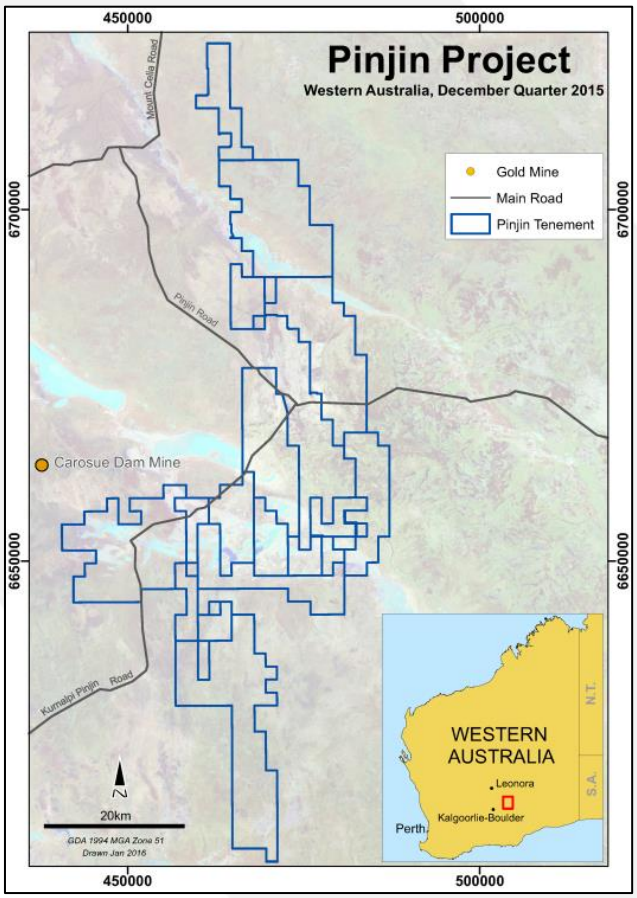

Figure 4.0 Simberi Island Location Map, Papua New Guinea

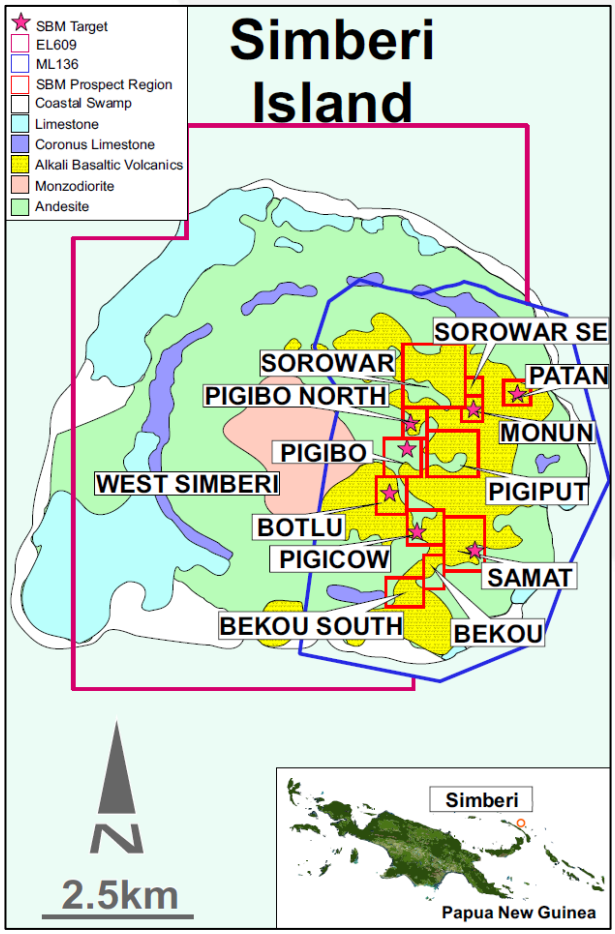

Figure 4.1 Big Tabar Island Location Map, Papua New Guinea

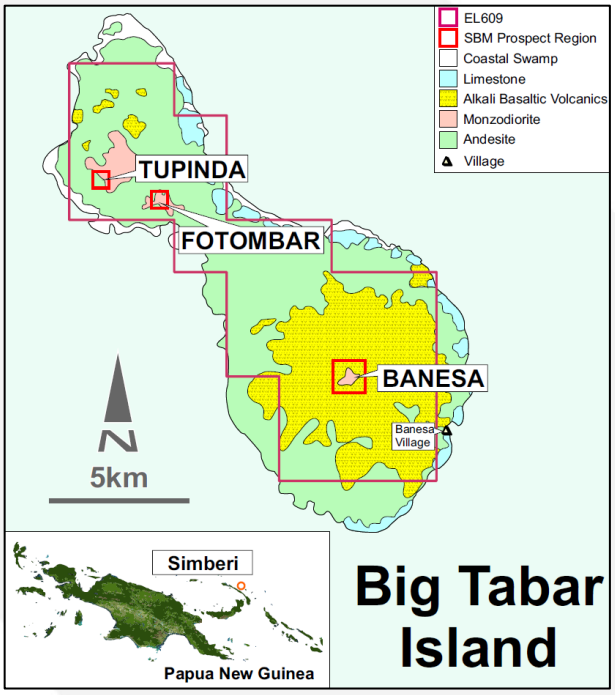

Figure 4.2 Pigibo North Drill and Trench Location Map, Simberi ML 136, Papua New Guinea

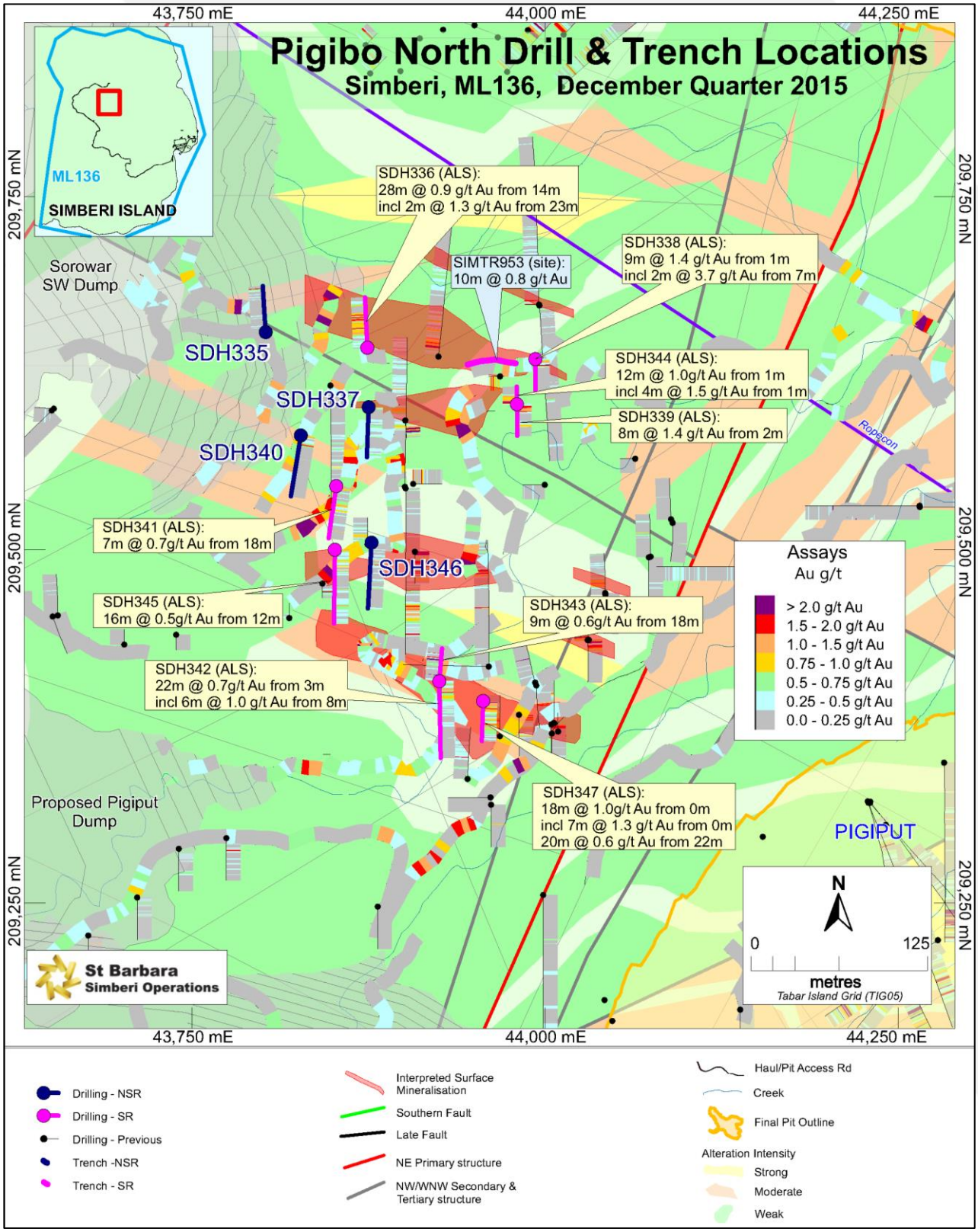

Figure 4.3 Patan Drill Location Map, Simberi ML 136, Papua New Guinea

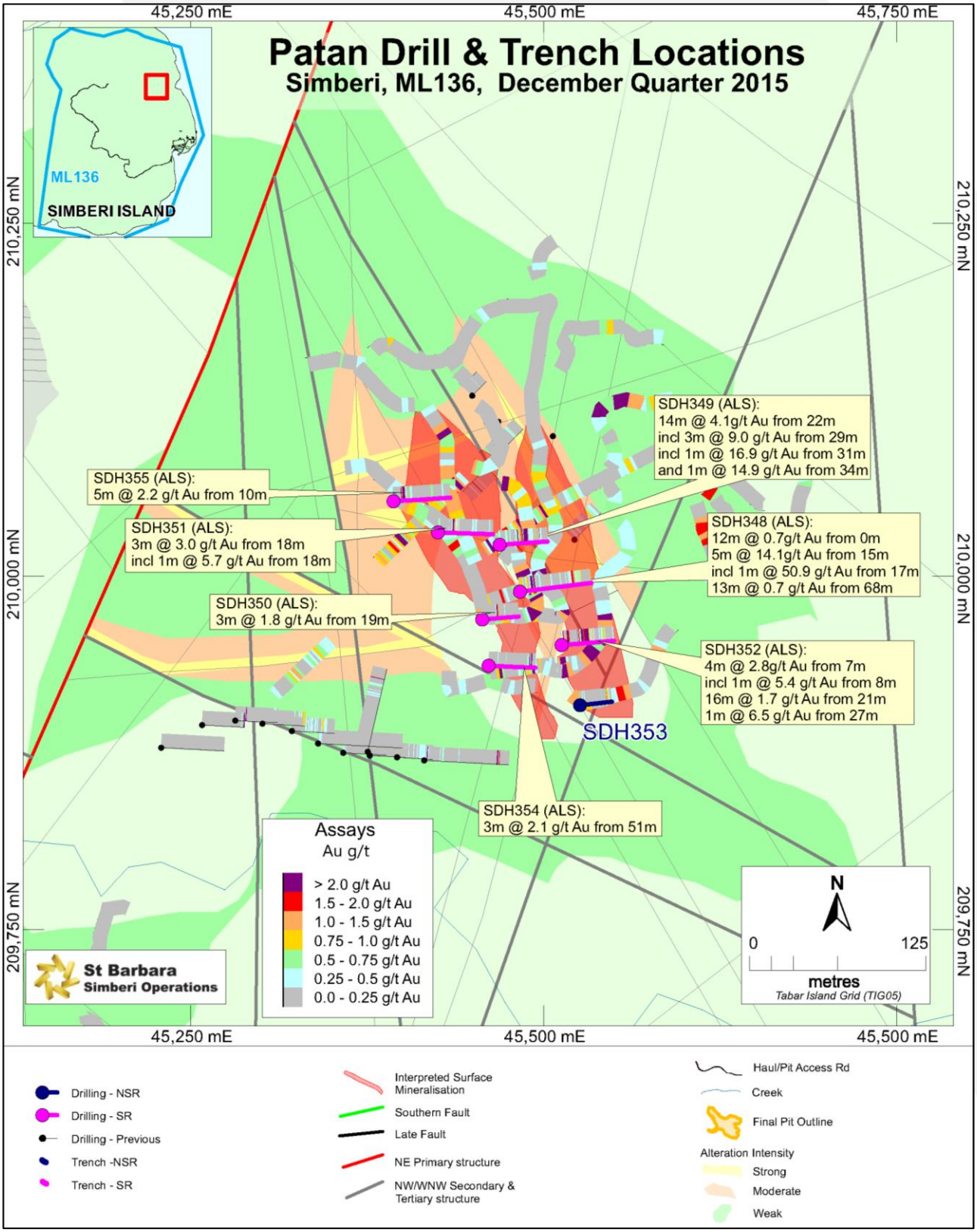

Figure 4.4 West Simberi Surface Sample Location Map, Papua New Guinea

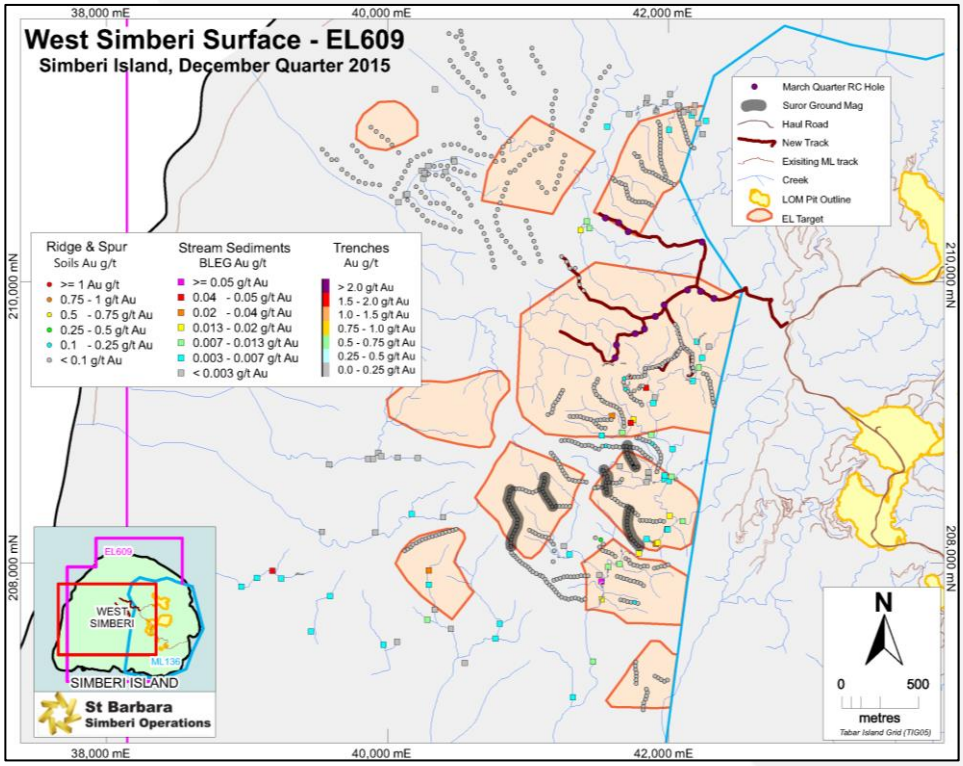

Figure 4.5 Banesa Trench Location Map, Big Tabar Island, Papua New Guinea

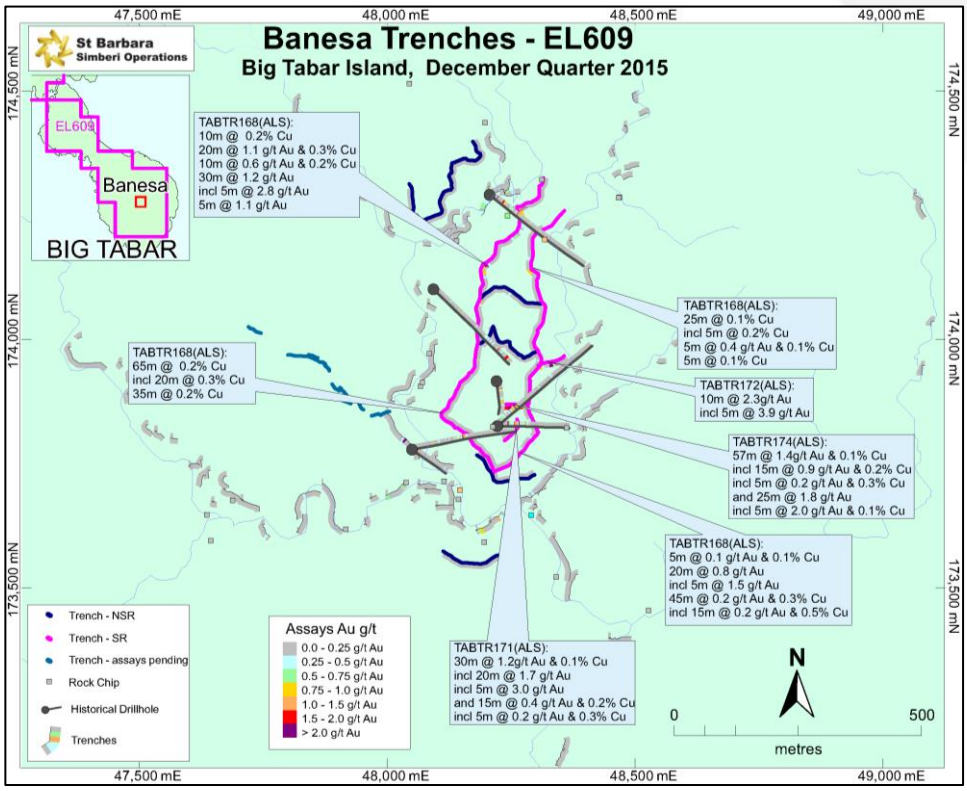

Table 1: Gwalia Deeps Significant Intercepts– Leonora Operations, Gwalia Mine

Hole Id	Down-hole Mineralised Intersection									
	North m	East m	RL m	Metres Below Surface	Lode	Dip/ Azimuth degrees	From m	To m	Interval m	Gold grade g/t Au
GWDD13I	5520.0	9760.3	3533.4	1842	Main Lode	-28/238	2151.6	2151.9	0.3	6.9
GWDD13I	5510.8	9744.7	3523.80	1851	South West Branch	-28/241	2170.1	2174.3	4.2	3.0
GWDD13I	5495.7	9715.1	3506.7	1868	South Gwalia Series	-27/243	2208.3	2211.0	2.7	4.3
GWDD13I	5493.8	9711.1	3504.5	1871	West Lode	-27/243	2214.0	2215.2	1.2	15.8
GWDD13J	5581.5	9738.9	3546.0	1829	Main Lode	-20/256	2135.4	2137.2	1.8	5.9
GWDD13J	5578.1	9725.6	3540.7	1834	South West Branch	-21/256	2149.7	2152.3	2.6	67.2
GWDD13J	5568.1	9682.0	3523.9	1851	South Gwalia Series	-20/260	2196.7	2200.8	4.1	5.7
GWDD13J	5564.7	9662.9	3516.8	1858	West Lode	-20/260	2218.9	2220.0	1.1	3.1
GWDD13K	5529.7	9819.2	3479.4	1896	Main Lode	-40/236	2139.7	2141.1	1.4	1.4
GWDD13K	5520.9	9805.9	3465.9	1909	South West Branch	-40/237	2159.6	2163.1	3.5	25.3
GWDD13K	5502.5	9775.1	3436.1	1939	South Gwalia Series	-39/240	2202.0	2214.0	12.00	3.0
GWDD13L	5507.5	9884.3	3414.8	1960	Main Lode	-50/221	2166.0	2166.6	0.6	2.7
GWDD13L	5498.4	9876.7	3400.8	1974	South West Branch	-50/220	2182.7	2186.6	3.9	0.9
GWDD13L	5469.2	9851.4	3355.2	2020	South Gwalia Series	-50/222	2238.8	2250.0	11.2	5.6
GWDD17	5424.8	9824.0	3478.9	1896	Main Lode	-57/295	2025.9	2027.5	1.6	6.2
GWDD17	5428.8	9815.6	3465.0	1910	South West Branch	-56/295	2042.9	2044.0	1.1	1.6
GWDD17	5438.4	9795.4	3432.0	1943	South Gwalia Series	-56/296	2080.1	2086.6	6.5	5.5
GWDD17A	5386.5	9818.4	3485.6	1889	Main Lode	-56/282	2016.8	2018.6	1.8	2.2
GWDD17A	5387.7	9813.1	3477.7	1897	South West Branch	-56/282	2025.3	2029.3	4.0	2.7
GWDD17A	5392.4	9792.0	3446.1	1929	South Gwalia Series	-56/282	2064.5	2066.7	2.2	2.0

NOTES:

No high grade cut is applied.
Dip and Azimuth angles estimated at intercept depth.
Azimuth referenced to Mine Grid
Reported intercepts are all down hole lengths.

Table 2: Centenary Significant Intercepts

Hole Id	North	East	RL	Metres Below Surface	Down-hole Mineralised Intersection					
					Element	Dip/ Azimuth degrees	From m	To m	Interval m	Grade ppm
CNRD004	6,843,900	317,894	383	53	Ni	-60/273	58	65	7.0	5651

NOTES:

No high grade cut is applied.
Dip and Azimuth angles estimated at intercept depth.
Azimuth referenced to MGA94_51 Grid
Reported intercepts are all down hole lengths.

Table 3: Pigibo North and Patan Significant Intercepts–Simberi Island, Papua New Guinea

Hole Id	North	East	RL	Dip/ Azimuth degrees	Total Depth	Vertical Depth mbs	Lode	Down-hole Mineralised Intersection		
								From m	Interval m	Gold grade g/t Au
Pigibo North, Simberi Island, Papua New Guinea ML 136										
SDH335	209653	43806	162.5	-57 / 357	59.3			no significant results		
SDH336	209643	43876	163.4	-54 / 358	60.0	19.9	OX,TR,SU	14	28	0.9
including						18.1	TR	23	2	1.3
SDH337	209601	43874	174.0	-54 / 182	60.8			no significant results		
SDH338	209630	43998	159.6	-56 / 180	40.0	4.0	OX	1	9	1.4
including						5.6	OX	7	2	3.7
SDH339	209605	43951	152.8	-56 / 180	39.7	5.2	OX,TR	2	8	1.4
SDH340	209577	43828	164.4	-54 / 189	74.1			no significant results		
SDH341	209539	43856	183.0	-55 / 188	64.8	24.3	OX	18	7	0.7
SDH342	209405	43924	165.2	-55 / 179	94.8	15.2	OX,TR,SU	3	22	0.7
including						13.6	TR,SU	8	6	1.0
SDH343	209404	43924	165.3	55 / 005	40.9	16.3	TR,SU	18	9	0.6
SDH344	209608	43950	152.8	-55 / 359	21.8	7.2	OX,SU	1	12	1.0
including						4.7	OX	1	4	1.5
SDH345	209498	43853	201.5	-55 / 181	91.5	21.9	OX,TR	12	16	0.5
SDH346	209504	43880	210.3	-55 / 183	81.3			no significant results		
SDH347	209390	43959	178.1	-56 / 182	50.3	9.4	OX	0	18	1.0
including						4.8	OX	0	7	1.3
						23.8	OX,TR,SU	22	20	0.6
Patan, Simberi Island, Papua New Guinea ML 136										
SDH348	209988	45487	77.5	-56 / 083	92.7	5.0	OX	0	12	0.7
						11.1	OX	15	5	14.1
including						11.1	OX	17	1	50.9
						46.6	TR	68	13	0.7
SDH349	210023	45471	84.4	-55 / 086	59.7	20.9	OX,TR	22	14	4.1
including						21.8	OX	29	3	9.0
including						22.5	OX	31	1	16.9
and						24.0	TR,SU	34	1	14.9
SDH350	209969	45457	63.3	-56 / 086	46.0	19.3	SU	19	3	1.8
SDH351	210031	45425	57.9	-55 / 092	68.5	24.0	TR,SU	18	3	3.0
including						22.7	TR	18	1	5.7
SDH352	209951	45513	53.1	-56 / 086	66.6	12.1	OX	7	4	2.8
including						11.7	OX	8	1	5.4
						26.3	OX	21	16	1.7
including						25.2	OX	27	1	6.5
SDH353	209909	45526	34.3	-56 / 084	40.0			no significant results		
SDH354	209937	45461	37.4	-55 / 093	58.5	44.3	SU	51	3	2.1
SDH355	210053	45394	50.2	-56 / 087	71.5	13.6	OX,TR,SU	10	5	2.2

LEONORA (Gwalia Deeps)- JORC Code, 2012 Edition – Table 1

Contents

Drilling: Section 1 Sampling Techniques and Data

Section 2 Reporting of Exploration Results

Drilling - Section 1 Sampling Techniques and Data

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

Criteria	Commentary
Sampling techniques	• Half-core sampling of NQ2 diamond drilling with boundaries defined geologically. Samples are mostly one metre in length unless a significant geological feature warrants a change from this standard unit. The upper or right-hand side of the core is submitted for sample analysis, with each one metre of half core providing between 2.5 – 3 kg of material as an assay sample.
Drilling techniques	• Diamond drilling using NQ2 (50.6mm) sized core (standard tubes). Holes have been surveyed using a single shot electronic camera. All core is orientated using a Reflex ACT II RD orientation tool.
Drill sample recovery	• Core is metre marked and orientated and checked against drillers blocks to ensure that any core loss is accounted for. • Sample recovery is rarely less than 100%. Where minor core loss does occur it is due to drilling conditions and not ground conditions.
Logging	• All SBM holes are logged primarily for lithology, alteration and vein type/intensity which are key to modelling gold grade distributions. Validation of geological data is controlled via the use of library codes and reliability and consistency of data is monitored through regular peer review. • All logging is qualitative.
Sub-sampling techniques and sample preparation	• SBM half core is cut using a core saw before being sent to SGS laboratory in Kalgoorlie where the entire sample is crushed to achieve particle size <4mm followed by complete pulverisation (90% passing 75 μm).
Quality of assay data and laboratory tests	• SBM samples were analysed for gold using fire assay with a 50g charge and analysis by flame Atomic Absorption Spectrometry (AAS). QC includes insertion of 3 commercial standards (1 per 20 samples), barren material used for blank control samples, use of barren flush material between designated high grade samples during the pulverising stage, re-numbered sample pulp residues re-submitted to original laboratory, and sample pulp residues submitted to accredited umpire laboratory, submission of residual (duplicate) half core from ore intervals. The analysis of gold was sound and re-analysis of pulps showed acceptable repeatability with no significant bias.
Verification of sampling and assaying	• Sampling data is recorded electronically in spread sheets which ensure only valid non-overlapping data can be recorded. Assay and down hole survey data are subsequently merged electronically. All drill data is stored in a SQL database on secure company server.
Location of data points	• Collars for surface holes are recorded by DGPS. Upon completion of underground drill holes an authorised surveyor will pick up the collar by placing a survey rod into the hole to measure azimuth and dip. This process may also occur while the hole is in progress by surveying the drill rods in the hole.
Data spacing and distribution	• Data spacing for grade control drilling is approximately 10m x 15m from 1000mbs to 1480mbs, resource definition is approximately 20m x 30m and surface drilling is approximately 60m x 80m from 1580mbs to 1800mbs. Drilling data is sufficient to establish down plunge continuity for all lodes.
Orientation of data in relation to geological structure	• Sampling is perpendicular to lode orientations and is sound based on past production and underground mapping.
Sample security	• Company personnel or approved contractors only allowed on drill sites; drill samples are only removed from drill site by approved contractors to the company's secure core logging/processing facility; cut core is consigned to accredited laboratories for sample preparation and analysis.
Audits or reviews	• Regular reviews of core logging and sampling are completed through SBM mentoring and auditing. Additionally, regular laboratory inspections are conducted by SBM personnel. Inspections are documented electronically and stored on secure company server. No significant issues were identified.

Drilling - Section 2 Reporting of Exploration Results

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

Criteria	Commentary
Mineral tenement and land tenure status	• SBM has 100% ownership of the two tenements M37/25 and M37/333 over the Gwalia deposit.
Exploration done by other parties	• Western Mining Corporation (WMC) and Sons of Gwalia (SGW), have previously completed deep diamond drilling below 1,100 metres below surface
Geology	• Gold mineralisation occurs as a number of stepped, moderately east dipping, foliation parallel lodes within strongly potassic altered mafic rocks which extend over a strike length of approximately 500 metres and to a vertical depth of at least 2,000 metres below surface. The deposit exhibits significant down-plunge continuity but is interrupted at approximately 1,200 metres below surface (mbs) by a cross cutting post-mineralisation doleritic dyke, with a horizontal width of approximately 30 metres.
Drill hole Information	• Drill hole information is included in intercept table outlining mid-point co-ordinates including vertical hole depth and composited mineralized intercepts lengths and depth.
Data aggregation methods	• No high grade cut is applied to surface drilling (Gwalia Deeps) • A high grade cut of 70g/t Au is applied to West Lode consistent with underground reporting practices at SBM
Relationship between mineralisation widths and intercept lengths	• Down hole length is reported for all holes; true width is not immediately known until further drilling is completed and the orebody modelled.
Diagrams	• Appropriate diagrams are included within the body of the report
Balanced reporting	• Details of all holes material to Exploration Results have been reported in the intercept table.
Other substantive exploration data	• These holes test the deepest limits of mineralisation and no other data is available
Further Work	• Further exploration drill holes are planned
Balanced reporting	• Details of all holes material to Exploration Results have been reported in the intercept table.
Other substantive exploration data	• Data is included in the body of the report
Further Work	• Follow-up drilling is planned and is discussed in the body of the report

LEONORA (Centenary)- JORC Code, 2012 Edition – Table 1

Contents

Drilling: Section 1 Sampling Techniques and Data

Section 2 Reporting of Exploration Results

Drilling - Section 1 Sampling Techniques and Data

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

Criteria	Commentary
Sampling techniques	• Half-core sampling of NQ2 diamond drilling with boundaries defined geologically. Samples are mostly one metre in length unless a significant geological feature warrants a change from this standard unit. The upper or right-hand side of the core is submitted for sample analysis, with each one metre of half core providing between 2.5 – 3 kg of material as an assay sample.
Drilling techniques	• Diamond drilling using NQ2 (50.6mm) sized core (standard tubes). Holes have been surveyed using a single shot electronic camera. All core is orientated using a Reflex ACT II RD orientation tool.
Drill sample recovery	• Core is metre marked and orientated and checked against drillers blocks to ensure that any core loss is accounted for. • Sample recovery is commonly 100%. Minor intervals of faulted rock led to sections of lesser recovery.
Logging	• All SBM holes are logged primarily for lithology, sulphide assemblage, alteration and vein type/intensity. Validation of geological data is controlled via the use of library codes and reliability and consistency of data is monitored through peer review. • All logging is qualitative.
Sub-sampling techniques and sample preparation	• SBM half core is cut using a core saw before being sent to SGS laboratory in Perth where the entire sample is crushed to achieve particle size <4mm followed by complete pulverisation (90% passing 75 µm).
Quality of assay data and laboratory tests	• SBM samples were analysed for multi elements using induced coupled plasma spectroscopy (ICPS) (40Q). QC includes insertion of 3 commercial standards (1 per 20 samples).
Verification of sampling and assaying	• Sampling data is recorded electronically in spread sheets which ensure only valid non-overlapping data can be recorded. Assay and down hole survey data are subsequently merged electronically. All drill data is stored in a SQL database on secure company server.
Location of data points	• Collars for surface holes are recorded by DGPS.
Data spacing and distribution	• Four holes were drilled at specific locations targeting geophysical anomalies.
Orientation of data in relation to geological structure	• Orientation of geological structure is unknown
Sample security	• Company personnel or approved contractors only allowed on drill sites; drill samples are only removed from drill site by approved contractors to the company's secure core logging/processing facility; cut core is consigned to accredited laboratories for sample preparation and analysis.
Audits or reviews	• Regular reviews of core logging and sampling are completed through SBM mentoring and auditing. Additionally, regular laboratory inspections are conducted by SBM personnel. Inspections are documented electronically and stored on secure company server. No significant issues were identified.

Drilling - Section 2 Reporting of Exploration Results

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

Criteria	Commentary
Mineral tenement and land tenure status	• SBM has 100% ownership of the two tenements E37-916 and E37-917 covering the Centenary project.
Exploration done by other parties	• Sons of Gwalia (SGW), have previously completed shallow aircore drilling through the area
Geology	• Anomalies within E37-916, located close to the interpreted western boundary of the felsic-volcanic dominated stratigraphic package hosting the Jaguar and Bentley copper-zinc-silver volcanogenic massive sulphide deposits. The anomaly within E37-917 is hosted within a nnw trending ultramafic sequence.
Drill hole Information	• Drill hole information is included in intercept table outlining mid-point co-ordinates including vertical hole depth and composited mineralized intercepts lengths and depth.
Data aggregation methods	• No high grade cut is applied.
Relationship between mineralisation widths and intercept lengths	• Down hole length is reported for all holes; true width is not immediately known until further drilling is completed and an orebody modelled.
Diagrams	• Appropriate diagrams are included within the body of the report
Balanced reporting	• Details of all holes material to Exploration Results have been reported in the intercept table.
Other substantive exploration data	• These holes test anomalies identified from a ground based geophysical program approximately 60 km north of Leonora
Further Work	• Further exploration drill holes and ground electromagnetic surveys are planned
Balanced reporting	• Details of all holes material to Exploration Results have been reported in the intercept table.
Other substantive exploration data	• Data is included in the body of the report
Further Work	• Follow-up drilling and ground geophysical surveys are proposed

SIMBERI - JORC Code, 2012 Edition – Table 1

Contents

Drilling - Section 1 Sampling Techniques and Data

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

Criteria	Commentary
Sampling techniques	• Diamond Drilling - Sampled using PQ (85mm), HQ (63.5mm) or HQ3 (61.1mm) and on occasion NQ2 (50.5mm) or NQ3 (45mm) sized core using standard triple tubes. Half core was sampled on nominal 1-metre intervals with the upper or left - hand side of the core prepped on-site to produce a 200gm pulp sample. A 50gm charge was then extracted from the 200gm pulp for Au fire assay and ICP - AES base metal analysis.
Drilling techniques	• Diamond Drilling comprised PQ (85mm), HQ (63.5mm) or HQ3 (61.1mm) and on occasion NQ2 (50.5mm) or NQ3 (45mm) core recovered using 1.5m to 3m barrels. When ground conditions permit, an ACT Digital Core Orientation Instrument was used by the contractor to orientate the core.
Drill sample recovery	• Diamond drilling recovery percentages were measured by comparing actual meters recovered per drill run versus meters measured on the core blocks. Recoveries averaged over >90% with increased core loss present in fault zones and zones of strong alteration. No relationship exists between sample recovery and grade.
Logging	• Diamond holes are qualitatively geologically logged for lithology, structure and alteration and qualitatively and quantitatively logged for veining and sulphides. Diamond holes are geotechnically logged with the following attributes qualitatively recorded - strength, infill material, weathering and shape. Whole core together with half core, were photographed when wet. • All holes are fully logged.
Sub-sampling techniques and sample preparation	• Diamond core was sampled largely on 1 metre intervals. Core was cut with the upper or left-hand side of the core routinely submitted for total pulverisation (85% passing 75 µm). Quality control of sub-sampling consisted of insertion of blank control samples and coarse reject duplicates ,both at a ratio of 1:20 samples. The samples were fully prepared at the company's on-site sample preparation facility on Simberi Island with 200g pulps sent to ALS Laboratory in Townsville. • Pulp residues are stored in Townsville for future re-assay if required.
Quality of assay data and laboratory tests	• Half Core samples were analysed for gold using fire assay with a 50g charge and analysis by flame atomic absorption spectrometry. Base metals were analysed by Aqua Regia digestion using Inductively Coupled Plasma Atomic Emission Spectroscopy (ICP-AES). QC included insertion of certified reference material (1 in 20); insertion of in-house blank control material (1 in 20); and the insertion of reject residues (1 in 20). QAQC results were assessed as each laboratory batch was received and again on a quarterly basis. Results indicate that pulveriser bowls were adequately cleaned between samples. Overall, the analysis of gold was sound.
Verification of sampling and assaying	• Sampling data is recorded electronically which ensures only valid non-overlapping data can be recorded. Assay and downhole survey data are subsequently merged electronically. All drill data is stored in a SQL database on secure company server. No twin holes have been completed.
Location of data points	• All Simberi Island collars were surveyed by in-house surveyors using DGPS using Tabar Island Grid (TIG) which is based on WGS84 ellipsoid and is GPS compatible (RC holes reported in this period are still pending pickup by dGPS). Tatau and Tabar Island collars were surveyed by hand held GPS. All holes were downhole surveyed using either a Reflex or Ranger single shot camera with the first reading at about 15m and then approximately every 30m increments to the bottom-of-the hole.
Data spacing and distribution	• Drilling data is not yet sufficient to establish continuity of the lodes and therefore the drill spacing is irregular and broad spaced.
Orientation of data in relation to geological structure	• Where surface mapping and sampling has contributed to understanding of outcropping geological structures, drilling and sampling has been undertaken orthogonal to the mapped structure.
Sample security	• Only company personnel or approved contractors are allowed on drill sites; drill core is only removed from drill site to secure core logging/processing facility within the gated exploration core yard; core is promptly logged, cut and prepped on site. The 200gm pulps are then consigned to ALS in Townsville for Au-base metal analysis.
Audits or reviews	• No audits or reviews of sampling protocols have been completed.

Drilling - Section 2 Reporting of Exploration Results

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

Criteria	Commentary
Mineral tenement and land tenure status	• SBM has 100% ownership of the two tenements over the Simberi Islands; ML136 on Simberi Island, and EL609 which covers the remaining area of Simberi Island, as well as Tatau Island and Big Tabar Island.
Exploration done by other parties	• CRA, BHP, Tabar JV (Kennecott, Nord Australex and Niugini Mining), Nord Pacific, Barrick and Allied Gold have all previously worked in this area. Nord Pacific followed by Allied Gold were instrumental in the discovery and delineation of the 5 main oxide and sulphide deposits at Simberi.
Geology	• The Simberi gold deposits are low sulphidation, intrusion related adularia-sericite epithermal gold deposits. The dominant host rocks for mineralisation are andesites, volcanoclastics and lesser porphyries. Gold mineralisation is generally associated with sulphides or iron oxides occurring within a variety of fractures, such as simple fracture in-fills, single vein coatings and crackle brecciation in the more competent andesite units, along andesite/polymict breccia contact margins as well as sulphide disseminations. On Tatau and Big Tabar Islands, located immediately south of Simberi, potential also exists for porphyry Cu-Au, epithermal quartz Au-Ag and carbonate-base metal Au mineralisation.
Drill hole Information	• Drill hole information is included in intercept table outlining collar position obtained by DGPS pickup, hole dip and azimuth acquired from a downhole surveying camera as discussed in section 1, composited mineralized intercepts lengths and depth as well as hole depth. Metres below surface (Mbs) for intercepts were calculated by measuring the distance between the midpoint of the intercept and a Lidar survey based topographic surface.
Data aggregation methods	• Broad down hole intercepts are reported as length weighted averages using a cut-off of 0.5 g/t Au and a minimum grade*length of 5gmpt. Such intercepts may include material below cut-off but no more than 5 sequential meters of such material and except where the average drops below the cut-off. Selvage is only included where its average grade exceeds 0.5 g/t Au. • Using the same criteria for included sub-grade, supplementary cut-offs, of 2.5g/t Au, 5.0g/t Au and 10g/t Au, may be used to highlight higher grade zones and spikes within the broader aggregated interval. Single assays intervals are reported only where ≥5.0g/t Au and ≥1m down hole. In core holes, core loss is assigned zero grade. No high grade cut is applied. • No metal equivalent values are used for reporting exploration results.
Relationship between mineralisation widths and intercept lengths	• Down hole length is reported for all holes; true width is not known as the orientation of the orebody is not fully understood.
Diagrams	• Diagrams show all drill holes material and immaterial to Exploration Results.
Balanced reporting	• Details of all holes material to Exploration Results have been reported in the intercept table, and all other drill holes drilled during the reporting period are highlighted on diagrams included in the report.
Other substantive exploration data	• Included in the body of the report. Core holes are routinely measured for bulk density determinations to be used for future resource modelling.
Further work	• Included in the body of the report.

Trenching - Section 1 Sampling Techniques and Data

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

Criteria	Commentary
Sampling techniques	• Sampling of trenches was done over measured intervals of between 1 and 5 meters dependent on geology. A geo-pick was used to collect a continuous channel sample from the trench faces across the designated interval with the samples collected in calico bags. Samples (3 to 5kg) were prepped on-site (jaw crushed, disk mill pulverised and then split) to produce a 200g pulp sample. A 25g charge was then extracted from the pulp for Au analyses by Aqua Regia digestion followed by an Atomic Absorption Spectroscopy (AAS) instrument finish.
Trenching/Benching techniques	• Trenches were created by both hand and mechanical techniques. Hand trenches were dug using spades, crowbars and shovels to depths of between 1 and 2 meters. Creek channel sampling is conducted in the same manner as trenches, where continuous exposure of bedrock is made by hand clearing of vegetation and cover. Mechanised trenches were dug by an excavator or dozer exposing up to 5 meters of trench wall.
Drill sample recovery	• N/A
Logging / Mapping	• All trenches were qualitatively geologically mapped for lithology, structure and alteration.
Sub-sampling techniques and sample preparation	• Samples are routinely submitted for total pulverisation (85% passing <75 µm) at the company onsite sample preparation facility on Simberi Island. • 200g pulps are sent to St Barbara's Simberi Laboratory where a 25g sub-sample is taken. • For Banesa trench samples, the 200g pulps were sent to ALS, Townsville for analysis.
Quality of assay data and laboratory tests	• The Mine Lease samples were analysed for gold at the Simberi Lab using Aqua Regia digestion with a 25g charge and analysis by Atomic Absorption Spectrometry. • The West Simberi and Banesa samples were analysed for gold at ALS (Townsville) via 50g fire assay and AAS finish (Method Au26). At Banesa, Cu, Ag, As, Fe, Mo, Pb, S, Sb and Zn were analysed via Nitric Aqua Regia Digestion and ICP-AES Finish (Method ME-ICP41). • QC included the insertion of two in house blanks at the start of each batch of trench samples, the insertion of certified copper-gold standards (1:100) as well as the collection of field duplicates (1:100).
Verification of sampling and assaying	• Sampling data is recorded electronically which ensures only valid non-overlapping data can be recorded. Assay and trench survey data are subsequently merged electronically. All data is stored in a SQL database on secure company server.
Location of data points	• All trenches were initially surveyed by a handheld GPS to capture the trench start point. The GPS used the Tabar Island Grid (TIG) which is based on WGS84 ellipsoid. The path of the trench from the initial start point to the end was surveyed by Tape & Compass method. Trench interval coordinates were then generated using basic trigonometry. • Selected recent trenches have been picked up using dGPS.
Data spacing and distribution	• Trench data spacing is irregular and broad spaced.
Orientation of data in relation to geological structure	• Where preceding surface mapping and sampling of trenches has contributed to understanding of outcropping geological structures, trenching and sampling has been undertaken to extend the strike length of the mapped structure. However, in many of the areas the lode orientation is poorly understood.
Sample security	• Only company personnel or approved contractors are allowed on drill sites; drill core is only removed from drill site to secure core logging/processing facility within the gated exploration core yard; core is promptly logged, cut and prepped on site. The 200gm pulps are then consigned to ALS in Townsville for Au-base metal analysis.
Audits or reviews	• No audits or reviews of sampling protocols have been completed.

Trenching - Section 2 Reporting of Exploration Results

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

Criteria	Commentary
Mineral tenement and land tenure status	• SBM has 100% ownership of the two tenements over the Simberi Islands; ML136 on Simberi Island, and EL609 which covers the remaining area of Simberi Island, as well as Tatau Island and Big Tabar Island.
Exploration done by other parties	• CRA, BHP, Tabar JV (Kennecott, Nord Australex and Niugini Mining), Nord Pacific, Barrick and Allied Gold have all previously worked in this area. Nord Pacific followed by Allied Gold was instrumental in the discovery and delineation of the 5 main oxide and sulphide deposits at Simberi.
Geology	• The Simberi gold deposits are low sulphidation, intrusion related adularia-sericite epithermal gold deposits. The dominant host rocks for mineralisation are andesites, volcanoclastics and lesser porphyries. Gold mineralisation is generally associated with sulphides or iron oxides occurring within a variety of fractures, such as simple fracture in-fills, single vein coatings and crackle brecciation in the more competent andesite units, along andesite/polymict breccia contact margins as well as sulphide disseminations. On Tatau and Big Tabar Islands, located immediately south of Simberi, potential also exists for porphyry Cu-Au, epithermal quartz Au-Ag and carbonate-base metal Au mineralisation.
Trench/Bench Information	• Included in the report text and annotated on diagrams.
Data aggregation methods	• Broad trench intercepts are spikes within the broader aggregated interval using a cut-off of 0.5 g/t Au and a minimum grade*length of 5gmpt. Such intercepts may include material below cut-off but no more than 5 sequential meters of such material and except where the average drops below the cut-off. Selvage is only included where its average grade exceeds 0.5 g/t Au. • Using the same criteria for included sub-grade, supplementary cut-offs, of 2.5g/t Au, 5.0g/t Au and 10g/t Au, may be used to highlight higher grade zones and spikes within the broader aggregated interval. Single assays intervals are reported only where ≥1.0g/t and ≥5m trench length is intercepted. No high grade cut is applied. • At Banesa, the same method is applied to aggregate gold grades using a 0.5 g/t cut-off grade and minimum grade*length of 5gmpt with no more than 5m of internal dilution and similar selvage restrictions. Within the corresponding Au intercept, Cu grades are reported if above 0.1% Cu. For defining copper intercepts a minimum of 0.1% Cu cut-off grade over 5m is used to define copper aggregated intervals with the corresponding gold grade reported where it is above 0.1g/t Au. Gold grades below this are not reported. Such intercepts may include material below cut-off but no more than 10 sequential meters of such material and except where the average drops below the cut-off. Selvage is only included where its average grade exceeds 0.1 %Cu. Supplementary copper grades above 0.2% Cu and/or 0.5 g/t Au are used to highlight higher gold or copper grade zones within the broad zone. No high grade cut is applied. • No metal equivalent values are used for reporting exploration results.
Relationship between mineralisation widths and intercept lengths	• Trench intercepts are sampled along the length of the trench and are reported for all trenches; true width is not reported.
Diagrams	• Diagrams show all trenches material and immaterial to Exploration Results.
Balanced reporting	• Details of all trenches material to Exploration Results have been reported in the text, and all other trenches dug during the reporting period are highlighted on diagrams included in the report.
Other substantive exploration data	• Included in the body of the report.
Further work	• Included in the body of the report.

Surface Sampling - Section 1 Sampling Techniques and Data

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

Criteria	Commentary
Sampling techniques	• Soil samples were collected by first digging through the organic A horizon until the B horizon was reached (Approximately 40cm depth). A bulk sample of approximately 3kg was then collected in a calico bag.
Drilling techniques	• N/A
Drill sample recovery	• N/A
Logging	• All Float and Soil samples were qualitatively logged for lithology, alteration, weathering and colour.
Sub-sampling techniques and sample preparation	• Soil samples were fully prepared at the company's on-site sample preparation facility on Simberi Island with 200g pulps sent to ALS Laboratory in Townsville for analysis.
Quality of assay data and laboratory tests	• Soil samples were analysed for gold by ALS Townsville using Aqua Regia digestion with a 50g charge and analysis by Inductively Coupled Plasma Mass Spectroscopy. Base metals were analysed using Inductively Coupled Plasma Atomic Emission Spectroscopy (ICP-AES). QC included insertion of field duplicates (1:100) and low level gold standards (1:100).
Verification of sampling and assaying	• N/A
Location of data points	• All sampling sites were surveyed by a hand held GPS using Tabar Island Grid (TIG) which is based on WGS84 ellipsoid and is GPS compatible.
Data spacing and distribution	• The sampling programs were designed to test the West Simberi catchment areas such that further stages of exploration could be planned.
Orientation of data in relation to geological structure	• N/A
Sample security	• Only trained company personnel were allowed to collect the samples; All samples were held within a secure company building before dispatch to ALS in Townsville for Au-base metal analysis.
Audits or reviews	• No audits or reviews of sampling protocols have been completed.

Surface Sampling - Section 2 Reporting of Exploration Results

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

Criteria	Commentary
Mineral tenement and land tenure status	• SBM has 100% ownership of the two tenements over the Simberi Islands; ML136 on Simberi Island, and EL609 which covers the remaining area of Simberi Island, as well as Tatau Island and Big Tabar Island.
Exploration done by other parties	• CRA, BHP, Tabar JV (Kennecott, Nord Australex and Niugini Mining), Nord Pacific, Barrick and Allied Gold have all previously worked in this area. Nord Pacific followed by Allied Gold was instrumental in the discovery and delineation of the 5 main oxide and sulphide deposits at Simberi.
Geology	• The Simberi gold deposits are low sulphidation, intrusion related adularia-sericite epithermal gold deposits. The dominant host rocks for mineralisation are andesites, volcanoclastics and lesser porphyries. Gold mineralisation is generally associated with sulphides or iron oxides occurring within a variety of fractures, such as simple fracture in-fills, single vein coatings and crackle brecciation in the more competent andesite units, along andesite/polymict breccia contact margins as well as sulphide disseminations. On Tatau and Big Tabar Islands, located immediately south of Simberi, potential also exists for porphyry Cu-Au, epithermal quartz Au-Ag and carbonate-base metal Au mineralisation.
Drill hole Information	• N/A
Data aggregation methods	• N/A
Relationship between mineralisation widths and intercept lengths	• N/A
Diagrams	• Figures 4.2, 4.4 and 4.5 show all sample sites material and immaterial to Exploration Results.
Balanced reporting	• All trench and soils sample locations any significant results are shown in Figures 4.2, 4.4 and 4.5.
Other substantive exploration data	• Included in the body of the report.
Further work	• Included in the body of the report.