



2018

Mineral Resources
and Mineral Reserves
Supplement



GOLD FIELDS

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	Disclaimer	(IBC)



Note: To be read in conjunction with the Gold Fields 2018 Integrated Annual Report (IAR). For abbreviations refer to p143; and for glossary of terms refer to p144; – Mineral Resource and Mineral Reserve Supplement 2018



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Exploration highlights



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Salares Norte project



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GJV Plan Construction

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Introduction and Group overview

Aim of this report

This report contains the Gold Fields Mineral Resource and Mineral Reserve statement as at December 2018. It provides key technical information to supplement the information summarised in the Integrated Annual Report (IAR) and it is available on the Company website at www.goldfields.com. In addition to providing transparent and compliant information in accordance with the South African Code for the Reporting of Exploration Results, Mineral Resources and Mineral Reserves (SAMREC Code), 2016 edition, this supplement highlights issues viewed as material to the reporting of Mineral Resources and Mineral Reserves per mining asset and growth project. Gold Fields' commitment to materiality, transparency and competency in its public reporting remains of paramount importance and continues to be endorsed by the Group's external audit and assurance protocol.

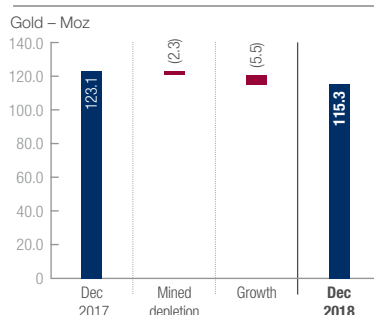
Headline numbers – Group overview December 2018

This year's Mineral Resource and Mineral Reserve position reflects the Company strategy in action, specifically the consistent funding of brownfield exploration, reinvestment in the sustainability and growth of the operations, embedded Business Improvement (BI) programmes and the advancement of quality projects. The robustness of the Mineral Resources and Mineral Reserves is testimony to the quality of the assets in the portfolio and is the result of a rigorous annual planning process that enforces a strong linkage between strategic, business and life-of-mine (LoM) planning that underpins alignment with Group objectives.

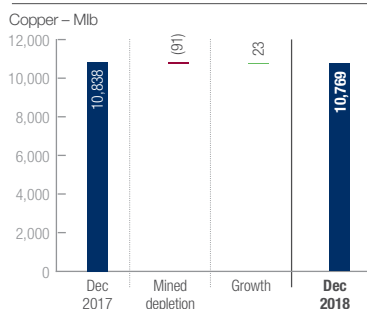
		MANAGED	ATTRIBUTABLE
DECEMBER 2017	Au Mineral Resources	123.1Moz	103.7Moz
	Cu Mineral Resources	10,838Mlb	4,881Mlb
	Au Mineral Reserves	53.1Moz	49.0Moz
	Cu Mineral Reserves	767Mlb	764Mlb
12-MONTH DEPLETION	Au production depletion from Mineral Resources	2.3Moz	2.2Moz
	Cu production depletion from Mineral Resources	91Mlb	91Mlb
	Au production depletion from Mineral Reserves	2.1Moz	2.0Moz
	Cu production depletion from Mineral Reserves	88Mlb	88Mlb
DECEMBER 2018	Au Mineral Resources	115.3Moz	96.6Moz
	Cu Mineral Resources	10,769Mlb	4,813Mlb
	Au Mineral Reserves	51.9Moz	48.1Moz
	Cu Mineral Reserves	695Mlb	691Mlb

- Group total figures for 2018, inclusive of projects, but exclusive of Asanko JV, are net of depletion
- The gold and copper prices used for the December 2018 Mineral Resources were US\$1,400/oz and US\$3.2/lb and for the Mineral Reserves, US\$1,200/oz and for copper a sliding scale from short to long term of US\$2.5/lb to US\$2.8/lb were used
- Measured and Indicated Mineral Resources are reported inclusive of those Mineral Resources modified to produce Mineral Reserves

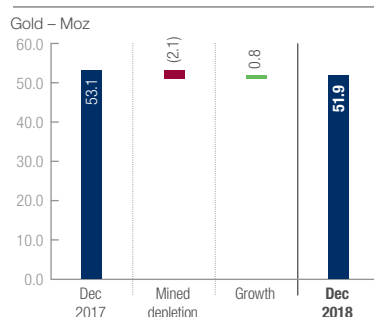
GFI-managed Mineral Resource reconciliation



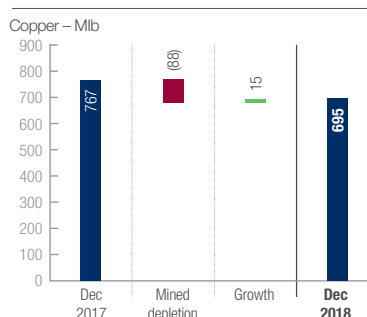
GFI-managed Mineral Resource reconciliation



GFI-managed Mineral Reserve reconciliation



GFI-managed Mineral Reserve reconciliation



Introduction and Group overview continued

Global footprint

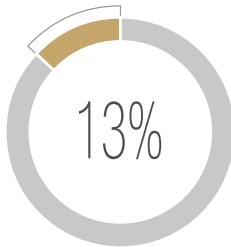
West Africa region*

MINE:

Gold Fields' West Africa region consists of three mines in Ghana; **Tarkwa**, **Damang** and **Asanko JV** (open pit gold mines)



Contribution to Group Mineral Reserves*

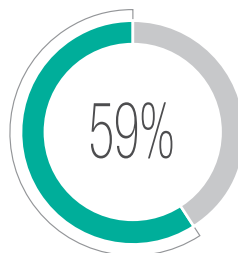


MINE:

The **South Deep** mine, which is still in production ramp-up phase, is the only operating asset in the South Africa region

South Africa region

Contribution to Group Mineral Reserves*



* Attributable equivalent Au oz

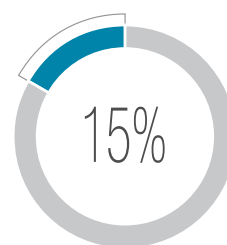


MINE:

Gold Fields' Americas region consists of the **Cerro Corona** mine in Peru and the **Salares Norte** project in Chile

Americas region*

Contribution to Group Mineral Reserves*

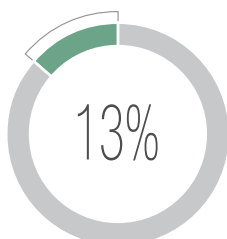


Australia region*

MINE:

The Australia region consists of four mines: **Agnew**, **Granny Smith** and **St Ives**, with the **Gruyere JV** starting production in 2019. Includes the Far Southeast project in the Philippines

Contribution to Group Mineral Reserves*



Introduction and Group overview continued

Group highlights*

Gold Resource decreased by 6%

- 115.3Moz (123.1Moz) driven primarily by South Deep (-10.2Moz) resulting from a detailed review of Current Mine's geotechnical and mining constraints and an increased cut-off grade
- Mineral Resources increased at all other operations net of depletion except for nominal reductions at Cerro Corona and Damang
- Consistent significant investment in brownfield exploration in Australia for 2018 A\$85M (US\$63M) continues to pay dividends at St Ives, Granny Smith and Agnew; A\$76M (US\$57M) is budgeted for 2019

Company strategy has delivered:

- Significant restructuring at South Deep during H2 2018 to recalibrate to a lower cost base and facilitate implementation of a revised operating model designed to drive productivity improvements
- Brownfield exploration and extensional discovery at St Ives, Agnew and Granny Smith in Australia
- Project advancement at Gruyere with first gold expected to be poured during Q2 2019 and good traction on the Damang Reinvestment Project with significant gold production from the target Damang cut back zone expected in 2020
- Salares Norte feasibility study (FS) completed and maiden Reserve reported for potential future mine with an indicative annual 355koz gold equivalent production for the first 10 years of the project

Gold Reserve decreased by 2%

- 51.9Moz (53.1Moz) driven primarily by South Deep (-4.6Moz) due to increased cut-off grade, updated geotechnical and related geotechnical loss factors, increased stoping loss factors and exclusion of the Ventersdorp Contact Reef (VCR) Reserve
- Inclusion of the maiden Salares Norte Reserve (3.5Moz gold or 4.1Moz gold equivalents)
- Increased proportion of Mineral Reserves outside of South Africa – total attributable gold-equivalent Mineral Reserves held by South Deep now 59%, down from 67% last year

Portfolio management

- Emphasis continues on improving the overall quality of the portfolio and to ensure the sustainability of the cash-flow generated by the operations
- Focus is on reducing Group all-in costs (AIC), capital discipline, increasing the free cash-flow (FCF)/oz and extending the life of the assets
- Near-mine exploration is also getting focus in Ghana at Damang, along the Amoanda-Tomento trend and at Tarkwa to profile potential palaeoplacer extensions to current open pits
- A joint venture (JV) with Asanko Gold was confirmed in July 2018 and emphasis is now on completing a fully integrated LoM plan, including finalisation of the Esaase open pit FS

Regional highlights

Australia region

- Resources grew by 7% – strong contribution from Granny Smith (11%), Agnew (5%) and St Ives (2%)
- Reserves grew by 4% – St Ives grew by 11%, Agnew 4%, Granny Smith 2% and Gruyere JV (GJV) by a nominal 1%

Americas region

- Resources were steady year-on-year – the 7% growth at Salares Norte was offset by an 11% depletion at Cerro Corona
- Reserves increased 270% – the Salares Norte 3.5Moz gold maiden Reserve inclusion was marginally offset by the 10% reduction due to production depletion at Cerro Corona

West Africa region

- Resources grew by 9% – Tarkwa grew 15% and Damang decreased by a nominal 1%
- Reserves decreased by 3% – Damang decreased by 7% and Tarkwa was 2% lower

South Africa region

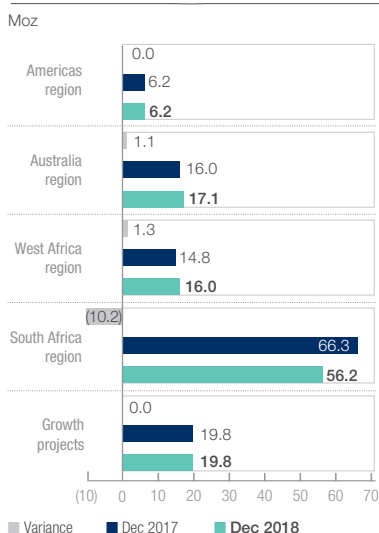
- Resources decreased by 15% at South Deep
- Reserves decreased by 12% at South Deep

Note

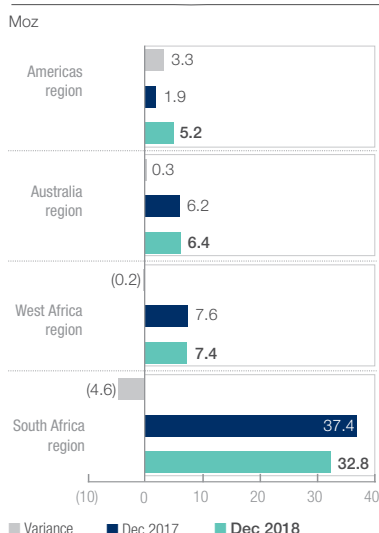
* All variances are post depletion and managed: (December 2017 numbers are shown in brackets)

The year-on-year gold Mineral Resource and Mineral Reserve changes per region are shown in the charts below:

Mineral Resource change per region



Mineral Reserve change per region



and not as metal equivalents, except where alternatively specified

Guiding principles

The key elements driving the Mineral Resource and Mineral Reserve strategy are centred on sustaining and growing cash-flow, profitability, return on investment and life extension. Strategic priorities include:

- Adherence to the strategic plan for each asset which informs the business plan and LoM plan phases that derive the Mineral Resources and Mineral Reserves
- Intensifying investment and activity in brownfield exploration (on-lease) to drive discovery and ongoing Mineral Reserve replacement and growth
- Building a quality portfolio of productive mines through active portfolio management leveraging lower-cost, longer life assets
- Emphasis on capital allocation to open up the ore bodies timeously, with supporting infrastructure to deliver the plan and secure flexibility
- Focus on quality, cash-accretive ounces while minimising marginal mining and avoiding high grading
- Application of appropriate Innovation and Technology (I&T) to improve operating efficiencies, reduce costs and realise ore body full potential
- Ensuring a strong social and regulatory licence to operate, with emphasis on LoM water, power security and shared value creation with stakeholders
- Divest mines or growth projects that are not closely aligned with the Company's business objectives

The charts above depict the Group's comparative 2018 versus 2017 managed gold Mineral Resource and Mineral Reserve ounces split by region and growth projects.

- Salares Norte and GJV are included in the Americas and Australia regions respectively
- The growth project resource only reflects the FSE project
- FSE accounts for 16% of the total 2018 Mineral Resource base but is Inferred only
- Mineral Resources (excluding FSE) comprise 18% Australia, 16% West Africa, 7% Americas and 59% South Deep
- Mineral Reserves comprise 13% Australia, 14% West Africa, 10% Americas and 63% South Deep

Important notices

- 1 All Mineral Resource and Mineral Reserve figures reported are 100% managed by Gold Fields unless otherwise stated
- 2 The GJV project is reported as 50% of the 'managed joint venture'. Gruyere is reported by Gold Fields as part of the GJV with Gold Road Resources. The SAMREC and JORC compliant Mineral Resources and Mineral Reserves reported match the figures in the February 2019 Gold Road Resources' ASX
- 3 The JV transaction with Asanko Gold (Asanko), with Gold Fields acquiring a 50% stake in Asanko's 90% interest in the Asanko gold mine in Ghana was completed on 31 July 2018
- 4 Mineral Resources are reported inclusive of Mineral Reserves, and Mineral Resources include stability pillars when appropriate
- 5 The Mineral Resources and Mineral Reserves are estimated at a point in time and will be affected by changes in the gold price, US\$ currency exchange rates, permitting, legislation, costs and operating parameters
- 6 Rounding off of figures in this report may result in minor computational discrepancies
- 7 All references to tonnes (t) are metric units
- 8 The 31 December 2018 Mineral Resource and Mineral Reserve figures are net of 2018 production depletion
- 9 Locations on maps are indicative only
- 10 All metals (gold, silver and copper) are reported individually

The information in this report is presented on a Group and regional basis, summarising the changes and current status at each operation and growth project. This report should be read in conjunction with the IAR, which provides additional information regarding the operations and their financial performance.

Introduction and Group overview continued

Headline Mineral Resource and Mineral Reserve statement

Gold Fields Mineral Resource and Mineral Reserve estimates

MINERAL RESOURCE HEADLINE NUMBERS¹

	Managed Mineral Resources						Attributable ounces	
	December 2018			December 2017			Dec 2018	Dec 2017
	Tonnes (Mt)	Grade (g/t)	Au (Moz)	Tonnes (Mt)	Grade (g/t)	Au (Moz)	Au (Moz)	
Gold (Au) only								
Total regions²	1,002.1	2.96	95.5	1,010.8	3.18	103.3	88.7	95.8
Total projects³	891.7	0.69	19.8	891.7	0.69	19.8	7.9	7.9
Total operating mines and projects	1,893.8	1.89	115.3	1,902.5	2.01	123.1	96.6	103.7
Cu and Ag as Au equiv. (Moz)	Individual metals detailed in table below							
Cerro Corona Cu as Au equiv ⁶			1.9			2.1	1.9	2.1
FSE Cu as Au equiv ⁶			22.7			22.7	9.1	9.1
Salares Norte Ag as Au equiv ⁷			0.6			0.7	0.6	0.7
Grand total as Au equivalents			140.5			148.6	108.2	115.6

OPERATIONAL SUMMARY¹

	Managed Mineral Resources						Attributable ounces	
	December 2018			December 2017			Dec 2018	Dec 2017
	Tonnes (Mt)	Grade (g/t)	Au (koz)	Tonnes (Mt)	Grade (g/t)	Au (koz)	Mineral Resource (koz)	
Au								
Australia region								
Agnew	12.3	5.16	2,049	11.5	5.25	1,946	2,049	1,946
Granny Smith	46.2	5.27	7,837	38.6	5.70	7,075	7,837	7,075
St Ives	33.2	3.68	3,928	34.4	3.47	3,847	3,928	3,847
Gruyere ¹	77.7	1.32	3,305	75.4	1.29	3,134	3,305	3,134
Total Australia region	169.5	3.14	17,120	160.0	3.11	16,002	17,120	16,002
South African region								
South Deep	328.0	5.32	56,152	381.6	5.41	66,318	50,955	60,350
Total South Africa region	328.0	5.32	56,152	381.6	5.41	66,318	50,955	60,350
Americas region								
Cerro Corona – Peru	107.7	0.65	2,263	115.0	0.69	2,542	2,252	2,530
Salares Norte – Chile	25.6	4.76	3,910	23.3	4.89	3,663	3,910	3,663
Total Americas region	133.2	1.44	6,173	138.3	1.40	6,205	6,162	6,193
Ghanaian region								
Damang	85.1	2.21	6,058	86.2	2.21	6,119	5,452	5,507
Tarkwa – Open Pits	213.2	1.30	8,891	172.5	1.37	7,583	8,002	6,825
Tarkwa – Stockpiles	73.1	0.46	1,091	72.2	0.46	1,074	982	967
Tarkwa – Total	286.3	1.08	9,983	244.7	1.10	8,657	8,984	7,792
Total West Africa region	371.4	1.34	16,040	331.0	1.39	14,776	14,436	13,299
GFI operations – total Au	1,002.1	2.96	95,485	1,010.8	3.18	103,301	88,674	95,843

	Managed Mineral Resources						Attributable ounces	
	December 2018			December 2017			Dec 2018	Dec 2017
	Tonnes (Mt)	Grade (% Cu)	Cu (Mlb)	Tonnes (Mt)	Grade (% Cu)	Cu (Mlb)	Attributable Cu (Mlb)	
Americas region								
Copper (Cu)								
Cerro Corona (Cu) only	102.7	0.37	848	107.9	0.39	917	844	913
Americas region								
Silver (Ag)								
Salares Norte (Ag) only	25.6	53.13	43,664	23.3	66.03	49,458	43,664	49,458

MINERAL RESERVE HEADLINE NUMBERS¹

	Managed Mineral Reserves						Attributable ounces	
	December 2018			December 2017			Dec 2018	Dec 2017
	Tonnes (Mt)	Grade (g/t)	Au (Moz)	Tonnes (Mt)	Grade (g/t)	Au (Moz)	Au (Moz)	
Au only								
Total operating mines and projects²	589.1	2.74	51.9	613.1	2.70	53.1	48.1	49.0
Cu and Ag as Au equiv.	Individual metals detailed in table below							
Cerro Corona Cu as Au equiv ⁸			1.6			1.8	1.6	1.8
Salares Norte Ag as Au equiv ⁹			0.6			—	0.6	—
Grand Total as Au equivalents			54.0			54.9	50.3	50.8

OPERATIONAL SUMMARY¹

	Managed Mineral Reserves						Attributable ounces	
	December 2018			December 2017			Dec 2018	Dec 2017
	Tonnes (Mt)	Grade (g/t)	Au (koz)	Tonnes (Mt)	Grade (g/t)	Au (koz)	Mineral Reserve (koz)	
Au								
Australia region								
Agnew	3.7	4.72	560	3.0	5.54	541	560	541
Granny Smith	12.6	5.54	2,246	12.4	5.51	2,203	2,246	2,203
St Ives	19.1	2.84	1,741	19.4	2.51	1,568	1,741	1,568
Gruyere ¹	47.1	1.25	1,894	48.7	1.20	1,871	1,894	1,871
Total Australia region	82.5	2.43	6,441	83.6	2.30	6,183	6,441	6,183
South Africa region								
South Deep ⁴	182.3	5.60	32,808	216.8	5.36	37,388	29,772	34,023
Total South Africa region	182.3	5.60	32,808	216.8	5.36	37,388	29,772	34,023
Americas region								
Cerro Corona	79.9	0.68	1,737	86.2	0.70	1,937	1,729	1,928
Salares Norte	21.1	5.13	3,476				3,476	—
Total Americas region	101.0	1.61	5,213	86.2	0.70	1,937	5,205	1,928
Ghanaian region								
Damang	28.9	1.74	1,616	31.9	1.68	1,728	1,454	1,555
Tarkwa Open Pits	121.4	1.20	4,687	122.5	1.23	4,831	4,218	4,348
Tarkwa Stockpiles	73.1	0.46	1,091	72.2	0.46	1,074	982	967
Tarkwa Total	194.5	0.92	5,778	194.7	0.94	5,906	5,200	5,315
Total West Africa region	223.4	1.03	7,394	226.6	1.05	7,634	6,654	6,871
GFI operations – total Au	589.1	2.74	51,856	613.1	2.70	53,143	48,072	49,005

	Managed Mineral Reserves						Attributable ounces	
	December 2018			December 2017			Dec 2018	Dec 2017
	Tonnes (Mt)	Grade (% Cu)	Cu (Mlb)	Tonnes (Mt)	Grade (% Cu)	Cu (Mlb)	Attributable Cu (Mlb)	
(PERU) – Cerro Corona Cu								
Cu only	79.9	0.39	695	86.2	0.40	767	691	764
(CHILE) – Salares Norte Ag								
Ag only	21.1	57.94	39,263				39,263	

¹ Managed unless otherwise stated; Gruyere only reports the 50% share attributable to Gold Fields; Measured and Indicated Mineral Resources are reported inclusive of those Mineral Resources modified to produce Mineral Reserves

² Gruyere and Salares Norte are included in the Australia and Americas regions, respectively

³ Projects – FSE Inferred Resource only – refer to p94 for project details

⁴ Reserve grade is inclusive of in section development tonnes, which cannot be separated from the ore flow, however, capital waste is excluded as there is a potential to separate it in the future

⁵ Metal prices used for equiv oz: US\$1,400/oz Au and US\$3.2/lb Cu. The metallurgical recovery rate (Au=69% and Cu=87%) and selling cost have not been applied to the conversion. Calculation: CuMlb*Cu Price (848*3.2)/Au price (1,400) = 1.9 Au equivalent (eq) Moz

⁶ Metal prices used for eq oz: US\$1,400/oz Au and US\$3.2/lb Cu. The selling cost, including refining and royalties, plus metallurgical recovery rate (Au=82% and Cu=93%), have not been applied to the conversion. Calculation: CuMlb*Cu Price (9,921*3.2)/Au price (1,400) = 22.7 Au eq Moz.

⁷ Metal prices used for eq oz: US\$1,400/oz Au and US\$20/oz Ag. Equivalency is based on the price ratio only – metallurgical recoveries (93% Au, 68% Ag) and selling costs (US\$16.76/oz Au, US\$1.41/oz Ag), including refining and royalties (1%) have not been included. (43.7*20/1400 = 0.6Moz Au eq)

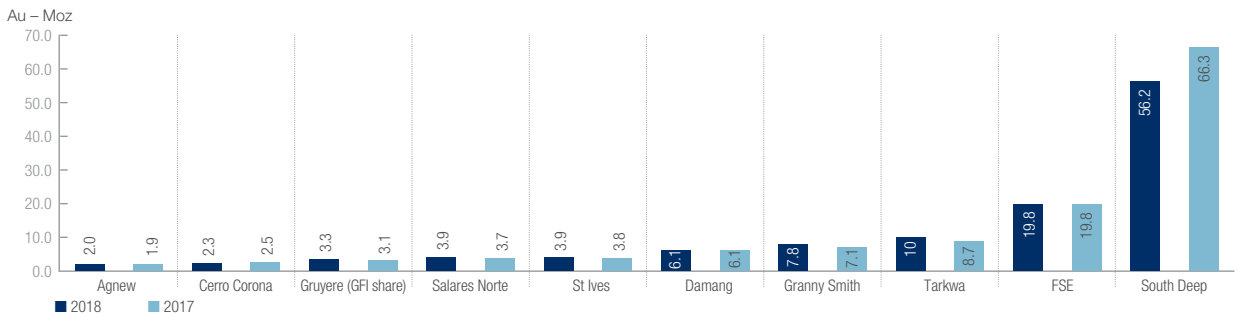
⁸ Metal prices used for eq oz: US\$1,200/oz Au and US\$2.8/lb Cu. The selling cost, including refining and royalties, plus metallurgical recovery rate (Au=69% and Cu=87%) has not been applied to the conversion. Calculation: CuMlb*Cu Price (695*2.8)/Au price (1,200) = 1.6 Au eq Moz

⁹ Metal prices used for eq oz: US\$1,200/oz Au and US\$17.5/oz Ag. The selling cost, including refining and royalties, plus metallurgical recovery rate (Au=93% and Cu=68%) have not been applied to the conversion. Calculation: AgMoz*Ag Price (39.3*17.5)/Au price/oz (1,200) = 0.6 Au eq Moz

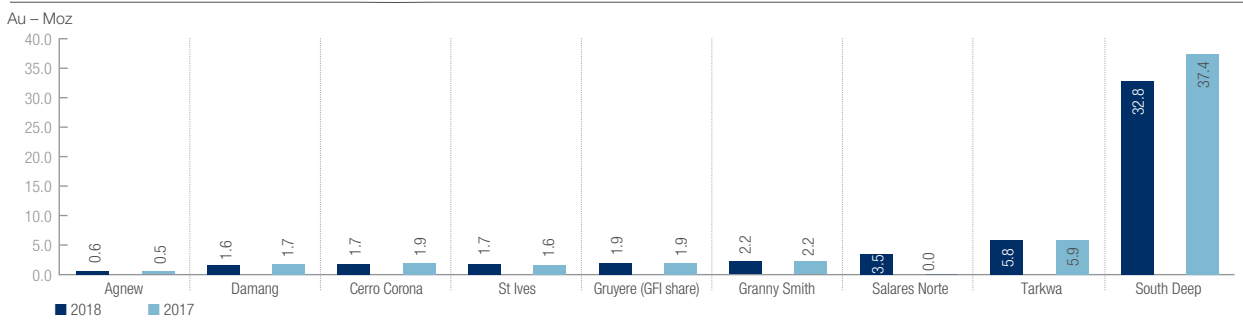
Introduction and Group overview continued

The year-on-year changes for managed gold Mineral Resources and Mineral Reserves are shown in the charts below, ranked from lowest to highest for December 2018.

Managed Mineral Resources



Managed Mineral Reserves



Global presence

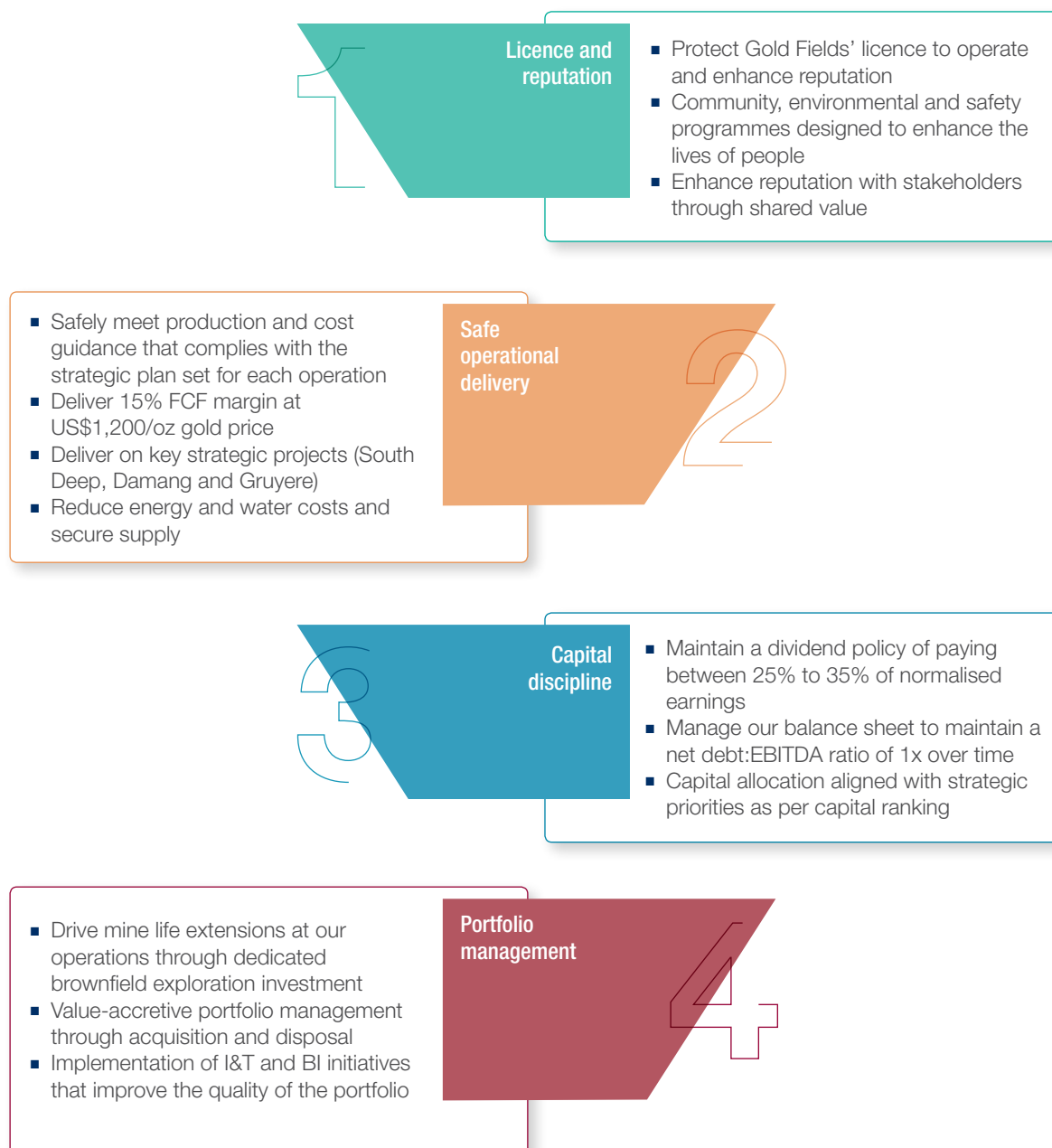


2018 in review

Our focus on long-term value

Gold Fields' vision to be the global leader in sustainable gold mining is anchored by a new Balanced Scorecard (BSC) framework introduced by the Company in 2018 to align the Group's efforts with our strategic objectives, and our aspiration of operating a portfolio of assets that produces gold at US\$900/oz AIC by 2020.

The BSC is organised into key themes, including:



These key themes define our strategic objectives, strategic focus areas and strategic initiatives, while making sure they are wired to the Company's aspiration and BSC measurement areas so that Gold Fields is configured to deliver sustainable long-term value while meeting all strategic objectives.

Introduction and Group overview continued

Operations and growth projects update

At the end of 2016, the Company initiated a reinvestment programme focused on ensuring the operations continue to generate cash sustainably into the foreseeable future, coupled with lowering costs and extending mine life. During the last two years, total project capital of US\$550M has been spent, primarily on Damang and Gruyere, and the Company is on track to set up the international operations to produce around 2Moz of gold a year barring operational disruptions or a significant decline in the gold price.

The Company successfully completed a feasibility study (FS) for the Salares Norte project in Chile and declared a maiden Mineral Reserve. The decision to construct a mine will depend on the outcome of the Environmental Impact Assessment (EIA), expected in early 2020. The Cerro Corona LoM extension project also made good progress with the in-pit tailings pre-feasibility study (PFS) concluded in 2018 now advancing to an FS, targeting completion in H1 2019.

During 2018, a 45% stake in the highly prospective Asanko Gold mine in Ghana was acquired, adding further capacity to the West Africa region. No Mineral Resource or Mineral Reserve figures for the Asanko JV are reported by Gold Fields in this Supplement due to the extensive geological and resource modelling programme embarked on in August 2018, which will be completed in Q1 2019. This work will provide a technically robust set of resource block models for all the open pits, which will feed into the mine design and planning phase, with the objective of generating an integrated LoM plan for the Asanko JV that aims to include the Esaase open pit FS as a core anchor to the LoM tonnage and metal profile. A comprehensive update to the Asanko JV Mineral Resource and Mineral Reserve statement is anticipated for H2 2019.

The international portfolio of operations met production targets in 2018 and also outperformed cost guidance. However, South Deep performed well below targets, so Group attributable production of 2.04Moz for the year was below original guidance of 2.08 – 2.1Moz.

Consistent and sizeable near-mine (brownfield) exploration investment continued in 2018 where A\$85M (US\$63M) was spent at Agnew, Granny Smith and St Ives to continue defining resource extensions, driving new discovery at each site to replenish the project pipeline, with both early and mid-stage targets to ensure a consistent flow of opportunities capable of providing take-over mining fronts into the future.

In the West Africa region, good progress was made in executing the Damang Reinvestment Project, with the project being on track in terms of development of the key enabling infrastructure including the Main pit, the Far East tailing storage facility (FETSF) and the processing plant enhancements. The establishment of contractor mining in 2018 at Tarkwa has received ongoing focus, and benefits continue to flow through to the operation as maximum traction from the changeover is realised.

A material restructuring at South Deep was announced in August 2018. This was aimed at reducing the workforce and underground mobile equipment levels in alignment with consolidating mining activity to increase focus, and to recalibrate the cost base and overhead structure with the anticipated level of production. Priority is to get the mine to break even at current levels of production, minimise the cash burn and to drive productivity improvements under the new operating model to bring the mine to profitability over time.

Emphasis is on the importance of South Deep achieving substantive results over the next 12 – 24 months and demonstrating traction on the mine's core strategic project themes, key performance indicators (KPIs) and enablers. Progress will be monitored during 2019 and performance trends will be taken account of and considered in generating this year's mine planning assumptions for input into the next LoM plan.

This year's Mineral Resource and Mineral Reserve position reflects the core elements of the Company strategy, specifically the consistent funding of brownfield exploration; reinvestment in the sustainability and growth of the operations; embedded BI programmes; quality project advancement; and strengthening relations with host communities whose partnership is vital in sustaining the operations and underpinning the viability of the Mineral Reserves.

2018 in review



Australia region

There were a number of important developments in the region in 2018:

- GJV advanced its engineering and fabrication work as well as preliminary production activities to position the project for first gold in Q2 2019 and 'substantial completion' of the project by end June 2019
- St Ives continued to develop the greater Invincible underground complex and the underground mining extension at Hamlet North, and commenced with the mining method study for the Palaeochannel Project
- Granny Smith progressed development of the Zone 110/120 mining project at Wallaby, extending production to circa 2027, and completed the interim Zone 135 PFS
- Agnew advanced development and commenced execution of the Waroonga North project which is pivotal to extending the LoM, and continued developing drill drives on the Sheba project at New Holland with the intent of establishing a new mining front
- Agnew site is currently developing projects to establish infrastructure for power, and accommodation that will enable the operation to be independent of the commercial agreements with BHP
- Continued execution of the regional exploration strategy to build a pipeline of high-quality targets to drive resource and reserve replacement and growth to offset annual depletion, and extend LoM profiles to enhance flexibility and optionality
- Exploration highlights at Agnew include further ore body definition at Waroonga North, Sheba South and FBH South, and the discovery of encouraging mineralisation at Redeemer Zone 2 (immediately north of the historic Redeemer pit)
- At Granny Smith, exploration highlights include good returns from the Resource Optimisation Project (ROP) within the shallower levels at Wallaby; extensions to Zones 90 and 250; and positive results from the Joey decline area
- St Ives' exploration highlights include ongoing growth at the Invincible complex down plunge and defining extensions to the Hamlet underground



Americas region

The following key developments for 2018 are highlighted:

- Cerro Corona's life has been extended to 2030 and the in-pit tailings FS is scheduled for completion in H1 2019. The life extension relies on the utilising of the mined pit as a new tailings storage facility supported by an increase in tailings density, plus a 3m increase in the dam wall of the current tailings dam to 3,803mRL
- A scoping study assessing opportunities for a further LoM extension is underway at Cerro Corona
- Lower grade ore stockpiling commenced at Cerro Corona in 2018 to allow for in-pit tailings disposal post 2021
- Sales of the Cerro Corona oxide stocks are ongoing, with ~2Mt of oxide ore sold in 2018
- A maiden Mineral Reserve for Salares Norte is reported, supported by a completed FS profiling 3.5Moz gold and 39.3Moz silver, equating to 4.0Moz total metal as gold equivalents for an initial 10-year mine life
- District exploration around Salares Norte focused on Aster 3, Aster 2 and the Helada Mayweather prospects, with the strategic intent of bolstering mineable resources to increase flexibility and extend the current LoM plan

Introduction and Group overview continued



South Africa region

The key activities undertaken in 2018 are listed:

- Fundamental restructuring at South Deep began in Q3 2018, anchored by a new operating model centred on closing marginal areas and consolidating mining activity to increase focus, with a commensurate reduction in the workforce and the size of the mobile equipment fleet
- The restructuring objective is to significantly lower the mine's cost base and achieve profitability, while also leveraging essential productivity improvements to deliver in the medium term
- Progress was made on a number of technical and planning fronts:
 - The mining footprint was reduced by suspending 87 Level and limiting activity to sustaining services at South Shaft
 - Increased focus on fleet utilisation and reliability to improve overall performance
 - Reduced capital associated with new mine development and non-critical path infrastructure
 - Significantly advancing in the geotechnical programme, enhancing ground support protocols and mine design and scheduling to further derisk the plan
 - Implemented long-hole stoping rig improvements based on increased stope availability and enhanced stope turnaround times
- Implemented efficiency improvement programmes based on five BI initiatives and supporting enabling projects
 - Enabling visible felt leadership
 - Reinvigorating the leadership system
 - Improving and enhancing the effectiveness of mining face time
 - Facilitating enabling logistics
 - Implementation of Horizon 1 I&T systems



West Africa region

The following key developments for 2018 are highlighted:

- Continued focus on embedding and leveraging optimal performance from contractor mining at Damang and Tarkwa
- Ongoing successful waste stripping of the Damang main pit is on track to open up the target ore horizon by mid-2020, which is central to the reinvestment plan
- Damang unconstrained project PFS commenced with the initial phase of the work programme
- Wall steepening projects were advanced at both Damang and Tarkwa, with increased pit slope angles applied to the Damang main pit west wall and selected areas at Tarkwa were also increased, with the latter to be optimised to realise the full opportunity in 2019
- Mine plan modifications were undertaken at Tarkwa due to blast restrictions applied to the Pepe 8, Atuabo and Mantraim pits, which are close to some of the structures belonging to the Brahaboboom local community. The Minerals Commission has granted approval for blasting activities within 400m of the community, subject to the implementation of blast controls and blasting protocols
- Exploration for hydrothermal style targets at Tarkwa has been curtailed, despite some promising results, due to lack of critical mass and efforts redirected to extensional opportunities on existing palaeoplacer ore bodies
- Scout drilling at Damang along the Amoanda-Tomento corridor returned encouraging results along a 1.5km strike extension to the Amoanda pit, and follow-up infill drilling is planned in 2019
- Established the Asanko JV in H2 2018 with current emphasis being on completing an integrated LoM plan encompassing the Esaase open pit project to provide an updated Resource and Reserve statement in H2 2019

Looking to 2019

The following key Mineral Resource and Mineral Reserve focus areas for 2019 support the Company strategy and are designed to leverage growth, life extension, capital discipline, reduce AIC/oz and increase FCF margin.

2019 operations and growth projects outlook – focus on Resource and Reserve growth

Americas

Cerro Corona life extension	<ul style="list-style-type: none"> ■ Complete the FS in H1 2019 for in-pit tailing project, extending life to 2030 ■ Continue sale of oxide ore stocks providing additional waste storage capacity ■ Complete geophysics and deep drilling programme below the resource pit shell
Salares Norte maiden Reserve	<ul style="list-style-type: none"> ■ Await outcome of the first phase of the Environmental Impact Assessment (EIA), received by Regulator in July 2018 (anticipate 18 – 24 month turnaround) ■ Progress detailed project engineering to circa 60% by year end ■ Finalise a detailed Project Execution Plan ■ Continue district exploration drilling to define additional mineable resources

Australia

Granny Smith	<ul style="list-style-type: none"> ■ Establish Zone 110/120 access, infrastructure and updated ground control support standards ■ Complete Joey decline FS below existing pit – access to shallow underground ore zones and potential debottlenecking decline (second decline to 90 level) for transport and ventilation ■ Enhance Zone 135 PFS with inclusion of full ore zone footprint and new geotechnical model ■ Maintain momentum on brownfield exploration outside of Wallaby underground
St Ives	<ul style="list-style-type: none"> ■ Progress production ramp-up to targeted volumes on Invincible underground mine ■ Maintain momentum on exploration in the Invincible complex, Lefroy JV, Kambalda west areas and follow up on the 3D seismic cubes ■ Commence Hamlet North development and production at Invincible South ■ Progress the Palaeochannel Project to meet a viability milestone decision
Agnew	<ul style="list-style-type: none"> ■ Continue mining the FBH and Kim South ore bodies while progressing Waroonga North to economic levels of production ■ Advance the Zone 2 North area to FS level ■ Develop and execute the Sheba 811 Level exploration platform at New Holland to facilitate definition of potential ore extensions ■ Generate a geodomain model to profile coarse gold behaviour and inform recovery trends
Gruyere joint venture (JV)	<ul style="list-style-type: none"> ■ Commence mining and increase understanding of in-pit ore and geotechnical aspects ■ First gold is expected to be poured during Q2 2019, and 2019 production guided at 118koz ■ Commission and stabilise the process plant to achieve steady state by 2020 ■ Attila and Alaric satellite open pit studies to support ore delivery in LoM profile

South Africa

South Deep	<ul style="list-style-type: none"> ■ Deliver the 2019 mine plan and financial targets ■ Support efficiency improvements with five main enabling BI programmes and related execution plan projects ■ Monitor momentum on the KPIs necessary to achieve medium- to longer-term profitability ■ Review mine planning assumption inputs to the next LoM plan based on the 2019 performance trends
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West Africa

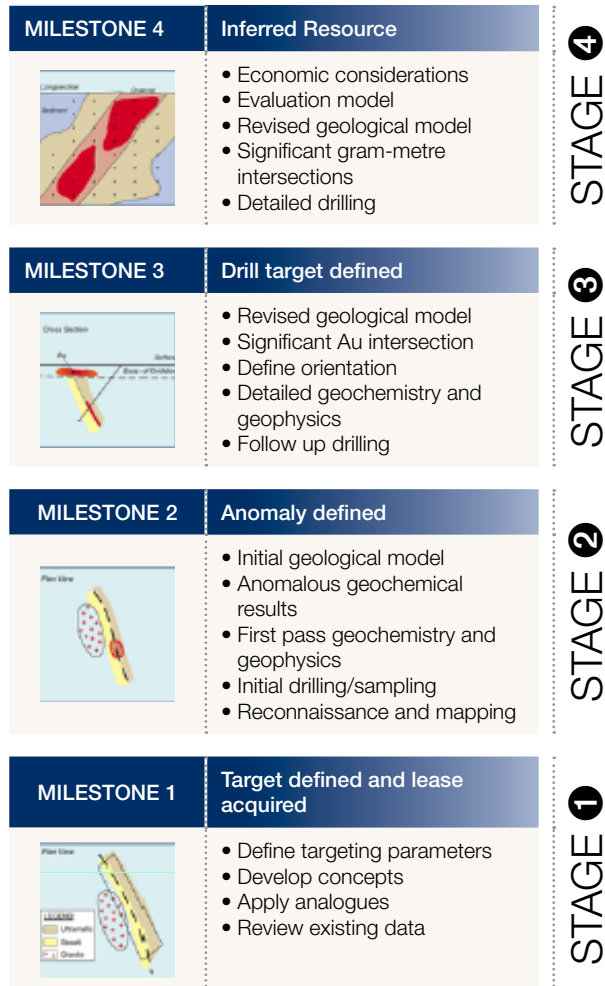
Tarkwa	<ul style="list-style-type: none"> ■ Continue leveraging contractor mining performance improvements ■ Complete wall steepening optimisation study and operationalise where appropriate ■ Revisit the palaeoplacer exploration targets focusing on Akontansi ULAP and Akontansi west
Damang	<ul style="list-style-type: none"> ■ Continue executing DRP with focus on the main pit reaching ore by mid-year 2019 ■ Complete the current Amoanda pit by end Q3 2019 ■ Complete the wall steepening optimisation at main pit ■ Staged infill drilling along the Amoanda-Tomento corridor to follow up positive scout drilling
Asanko JV	<ul style="list-style-type: none"> ■ Complete Esaase open pit option analysis to underpin FS ■ Progress integrated LoM plan to profile updated Resource and Reserve statement ■ Progress JV exploration strategy with focus on the Obotan-Esaase geological corridor

Introduction and Group overview continued

On-lease exploration

The Group's strategy of focusing on brownfield (on-lease or near mine) exploration to extend mine life continued during the year. The multi-year investment in exploration is yielding positive results and is configured to deliver a balanced project pipeline that includes identifying early-stage targets (Milestones 1 – 2) with project lead times of more than four to five years, combined with progressing more advanced projects that can potentially deliver new mining opportunities within the next two to three years.

The emphasis at all mine sites is to strive for Reserve replacement of annual depletion and to ensure the project pipeline is maintained so that discovery and the conversion of Resources to Reserves delivers to maintain business plan production profiles and cash-flow projections.



2018 exploration highlights

Group perspective

During 2018, the Group witnessed a continued strong focus on exploration in support of organic growth. The strategy that near-mine or on-lease exploration offers the best route to low-cost, low-risk Resource and Reserve growth in well-understood environments remains key. The emphasis at all mine sites is to ensure that the Reserve replacement and expansion pipeline is maintained and that the conversion of Resources to Reserves is timely and delivers to maintain Business Plan production profiles and cash-flow projections aligned to strategic objectives.

Summarised Group exploration spend demonstrates that US\$102.5M was spent in 2018 (US\$86.8M in 2017), with the bulk of the Group's brownfield (on-lease) exploration activity taking place in the Australia (62%), South America (24%) and West Africa (14%) regions, where the assets have strong growth and/or discovery potential.

Australia region

Strategic focus is on Resource and Reserve replacement at each operation on an annual basis, coupled with growing the Resource and Reserve base to maintain and extend life-of-mine profiles, to enhance flexibility and optionality. This will be achieved by ensuring only the highest probability targets are tested, foundational datasets are collected and non-geological criteria like 'time to mining' are considered in budget allocation. Particular attention is paid to ensuring in-ground expenditure is maximised.

Foundational datasets include full-field aircore drilling and high-resolution geophysical surveys, which assist in the collection of geochemical and structural data for target generation. Collection of this data early in the exploration process drives efficiency in exploration spend.

West Africa region

During 2018, activity was centred on brownfield exploration, with 74% of funds allocated to resource infill and extensional drilling on known ore bodies at Damang and Tarkwa. Gold Fields' 50% ownership of the Asanko JV paves the way for the discovery of resource extensions to current ore bodies as well locating new near mine deposits in the short to medium term. In addition, the Asanko JV provides the West Africa region with access to significant under-explored real estate, with high prospectivity and potential camp scale opportunities.

Americas region

In 2018, surface drilling was undertaken at Salares Norte to convert Inferred Resources to Indicated Resources at Agua Amarga (AA); to complete additional grade control campaign infill drilling at the Brecha Principal and AA deposits; and to explore the NW extension of AA beyond the pit limit. District exploration drilling focused on Aster 3 and Aster 2, as well as the Helada-May prospects, with the strategic intent of defining additional mineable Resources to bolster the overall LoM plan and increase flexibility and optionality for the project.

During 2018, Cerro Corona executed two distinct drilling programmes as part of the development of the LoM 2030 extension study. Seven holes (1,163m) were completed, with the goal of sterilising the future Arpon waste storage facility (WSF) foundation area. The second programme was executed as part of the hydrogeological investigation for the in-pit TSF solution (pivotal to the 2030 LoM) and six holes were completed, totalling 2,279m of diamond drill core.

South Africa

South Deep does not conduct true brownfield or on-lease exploration. However, a staged sequence of activities does drive the drilling programme designed for resource definition based on long-inclined borehole (LIB), mine definition drilling, and fit-for-purpose geological, geotechnical and cover drilling.

There has been a strong focus on accelerating underground diamond drilling at South Deep during 2018 to ensure adequate coverage for short- to medium-term planning. This was achieved through the compilation of a standard operating procedure for the mine definition drilling process. Improved collaboration between all functions involved with expediting safe and cost-effective drilling was realised, resulting in the drilling contractor significantly exceeding planned targets in 2018.

The actual exploration expenditure for the 2018 and 2017 periods is shown in the table below:

Region	December 2018		December 2017	
	Metres	Cost (US\$M)	Metres	Cost (US\$M)
Australia	418,794	63.3	680,832	75.4
West Africa	82,286	14.5	71,589	11.0
South Africa	1,775	0.3	2,248	0.4
South America ¹	53,417	24.4		
Total²	556,272	102.5	754,669	86.8

Notes:

■ Costs in US\$ (2018 Fx – ZAR13.2/US\$; A\$ = 0.75/US\$)

■ Expenditure includes non-drilling items (e.g. geophysics)

¹ December 2018 includes drilling at Salares Norte and Chile regional drilling

² The year-on-year reduction in total metres drilled is due to the increased ratio of diamond drilling, which is slower and higher cost, in support of the key underground projects at Agnew, St Ives and Granny Smith being advanced to provide new mining fronts

Introduction and group overview continued

2019 exploration outlook

The 2019 Group exploration programme continues to support the organic growth strategy with a budget of ~US\$76M. The emphasis remains on replacing production depletion, growing Reserves and adding mine life with ounces capable of sustaining and improving the all-in sustaining cost (AISC)/oz. The key focus areas for each of the regions in 2019 are summarised below:



Australia region

St Ives

- Foundational data collection on the Lefroy JV
- Further resource definition within the Invincible complex
- Open pit searches at Kambalda West and the southern tenure
- Continued testing of the 3D seismic cube targets

Granny Smith

- Continued Resource Optimisation Project (ROP) drilling at Wallaby
- Joey decline drilling
- Infill drilling of Zone 135 to define the extent of the ore body to aid mine design of the full PFS footprint
- Blurry BIF drilling on Lake Carey – outside Wallaby

Agnew

- Further testing of the Redeemer Zone 2 North target
- Drilling on the Sheba South project, New Holland
- Resource definition at Waroonga North and at the FBH South-Link structure

Gruyere JV

- Minor exploration will be undertaken at the GJV – targeted satellite pit infill drilling and likely inclusion of minor drill programmes along the “Golden Highway” (strike extension of the Attila-Alaric-Montagne system)



West Africa region

Tarkwa

- Focus is on extensional infill drilling at underlap North Extension, Teberbie Cut 4/Pepe North and Teberbie-Atuabo
- Scout drilling to take place along the northern extension of the Underlap target (outside of the current pit shell)
- Generative work is to continue, looking for new search space for primarily palaeoplacer opportunities

Damang

- Focus is on infill drilling along the Amoanda-Tomento trend, where recent drilling returned encouraging results
- The outcome of the drilling (depending on availability of funds), is expected to provide more flexibility to the Damang plant and/or a potential additional Resource to complement the Unconstrained Damang Project

Asanko

A three-pronged exploration strategy is directed at:

- Discovery of new oxide Resources within a 5km radius of the processing plant in the short term (1 – 2 years)
- Evaluation of the Obotan – Esaase Belt Corridor in the medium term (~2 – 4 years)
- In the longer term (>5 years), search for ore replacement along the South Camp area with credible potential for large-scale discovery as a replacement to the Nkran open pit



Americas region

Cerro Corona

- Exploration activity will focus on completing the deep drilling programme started during 2018; 5,000m of drilling are scheduled for 2019 below the current Cerro Corona resource and inventory pit shell
- The objective is to determine potential for viable economic mineralisation below the pit as part of the beyond 2030 scoping study

Salares Norte

- The exploration programme will continue drilling the most promising district targets, initially at Horizonte, Aster 2 and Helada-Mayweather
- Targets have been prioritised based on integration of the district airborne magnetic survey, district geological mapping, geochemistry and a Worldview 3 spectral alteration study



South Africa region

South Deep

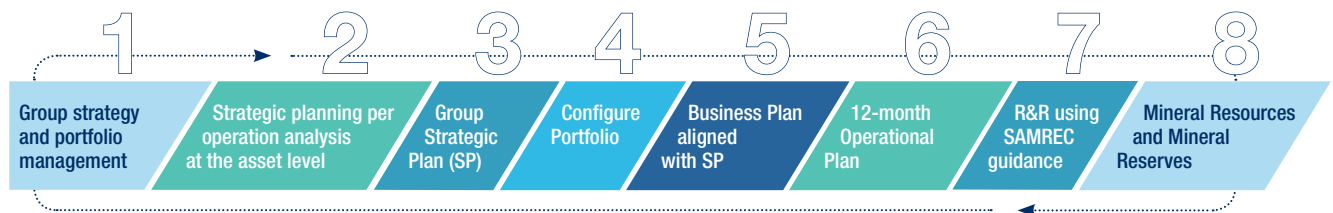
Focus is to manage geological risk and to maintain a 30m x 30m mine definition drilling grid to underpin an appropriate resource model for a detailed two-year mine planning window. Focus areas include:

- Corridor 4 to verify ore body sub-crop position
- Corridors 2A and 2B to increase overall drill density ahead of the cuts to support medium-term planning
- Corridor 1A mining has been deferred to 2020 to allow time to complete drilling
- LIB drilling to focus on Corridors 3 and 4 to support medium- and long-term planning

The mine planning cycle

Strategic context and planning

The intent of the strategic planning process is to provide a mechanism for operating sites to assess planning options at varying levels of technical, operational and financial risks, with reference to the Company's strategic goals. Strategic KPIs for each asset are pivotal around quality, life, licence to operate, cash-generation and scale, based on either annual metal produced or cash-flow. Our strategic planning aims to provide insight to a range of outcomes rather than refine and optimise a single option.



Optionality is assessed against strategic scenarios that profile (1) low metal prices (2) sustaining the business; (3) upside potential and (4) blue sky opportunity; and they provide essential guidance for operating strategies, required investment, and risk and reward management. By necessity, the strategic plans include an assessment of factored Inferred Mineral Resource and a view on property endowment potential for the blue sky, in addition to the Proved and Probable Mineral Reserve that defines the LoM plan.

In 2018, all sites presented internal growth options as part of Gold Fields' strategic planning process. This process allowed Gold Fields' management to rank projects and allocate capital to projects consistent with Gold Fields' strategic goals and provide guidance as to which projects have the capacity to improve the portfolio.

Gold Fields' strategy focuses on maintaining a sustainable cash-flow margin through inevitable economic cycles that are inherent in the industry. Key strategic themes in 2018 going forward, include the following:

- Consistent capacity to meet production and cost guidance
- Life extensions at our operations through brownfield exploration
- Value-accretive portfolio management
- Continued growth to achieve the strategic goals while maintaining capital discipline
- Execution of the Company's modernisation programme via the I&T strategy
- Complete the Salares Norte FS and progress the project
- Complete the Cerro Corona 2030 life extension FS and execute
- Deliver the GJV and DRP
- Achieve momentum and traction on the new operating model at South Deep

Business planning

Each year, the Business Plan represents a refinement of the preferred Strategic Plan Option and the process allows each site to develop a 12-month operational plan. This is done in the context of the long-term potential of the asset and allows the business to deploy essential resources to maximise the use of capital across the Group portfolio. The Business Plan includes factored Inferred Mineral Resources that provide essential information on the realistic Mineral Resource to Mineral Reserve conversion in the medium to long term.

LoM planning

In accordance with the SAMREC Code, the compliant Mineral Resource and Mineral Reserve that defines the LoM plan and cash-flow model for each asset is restricted to Proved and Probable Reserves. Importantly, the LoM plan and resultant Mineral Reserves demonstrate a strong linkage to the strategic and business plans that profile the Company's medium- to longer-term approach to realising full-site potential.

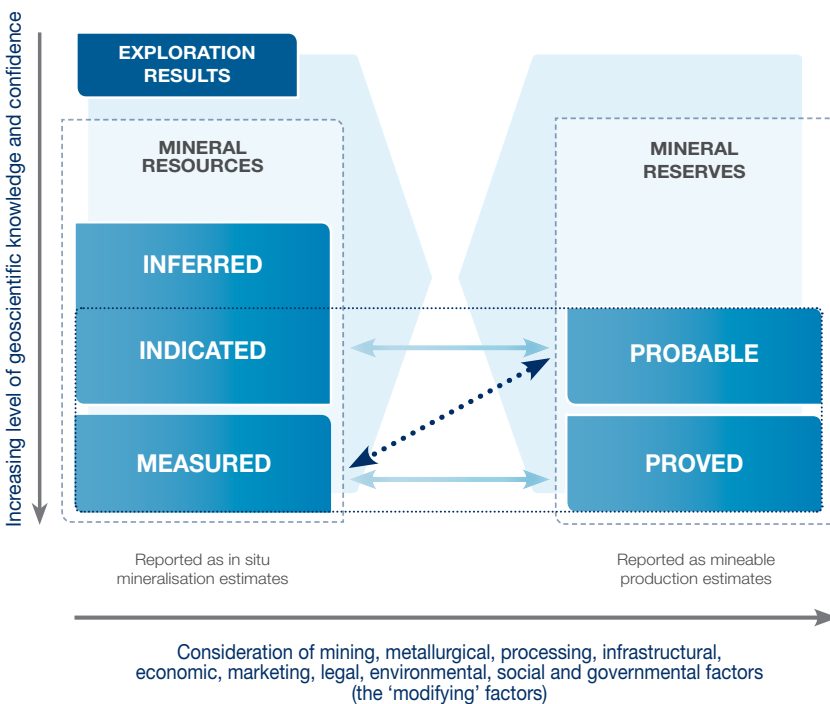
Introduction and group overview continued

Corporate governance

Reporting Code and Code of Practice

The Group's December 2018 Mineral Resource and Mineral Reserve estimate is in accordance with the requirements of the SAMREC Code, 2016 edition; the South African Code for the Reporting of Mineral Asset Valuation (2016 SAMVAL Code); and Industry Guide 7 for reporting on the United States Securities and Exchange Commission (SEC). The SAMREC Code covers public reporting and information that is prepared for investors or potential investors and their advisers, as well as other interested parties.

RELATIONSHIP BETWEEN EXPLORATION RESULTS, MINERAL RESOURCES AND MINERAL RESERVES



Reporting is also in accordance with Section 12 of the Johannesburg Stock Exchange (JSE) Listings Requirements and takes cognisance of other relevant international codes where geographically applicable. The definitions contained in the SAMREC Code are either identical to, or not materially different from, international codes.

The relationships between Mineral Resources and Mineral Reserves are depicted in the SAMREC classification diagram. Technical and operating procedures are designed to be compliant with the Sarbanes-Oxley Act framework as adopted by Gold Fields for Mineral Resource and Mineral Reserve estimation, auditing and reporting.

The SEC permits mining companies, in their filings with the commission, to disclose only those Mineral Reserves that a company can economically and legally extract or produce. In accordance with the SEC guidelines, companies are not permitted to report Mineral Resources in their Form 20-F submissions. However, certain terms referring to Mineral Resources are used in this Supplement, such as: 'Measured, Indicated and Inferred Mineral Resources. Consequently, US investors are urged to consider closely the disclosure in our Form 20-F.

Competent Persons

The Competent Persons (CPs) designated in terms of SAMREC, who take responsibility for the reporting of Gold Fields' Mineral Resources and Mineral Reserves are the respective operation-based geologists, resource estimators, mine planning engineers, technical managers and relevant project managers, as listed in the 'Supplementary information' section. The CPs have sufficient experience relative to the type and style of mineral deposit under consideration and, unless otherwise stated, are full-time employees of Gold Fields. Corporate governance on the overall regulatory compliance of these figures has been overseen and consolidated by the Gold Fields CP, Tim Rowland, who is a member of the Corporate Technical Services team. CP consent is hereby given to the disclosure of this Mineral Resource and Mineral Reserve estimate. Where metal equivalents are quoted, the calculations are shown; and it should be noted that the selling cost, including refining and royalties, plus metallurgical recovery rate, are excluded from the calculation. However, in the CPs' opinion, all metals so converted have a reasonable potential to be recovered and sold. As Gold Fields is primarily a gold producer, all metal equivalents have been converted to gold. The Corporate Technical Services team, covering the full Resource and Reserve value chain, is listed in the CP table.

Corporate governance on the overall compliance of these figures and responsibility for the generation of a consolidated statement has been overseen by the respective corporate CPs and discipline experts listed below:

Competent Person	Title	Qualifications	Years of experience
Tim Rowland ^{1, 3, 5} Number 400122/00	Vice-President: Group Geology, Resource Estimation and Mine Planning	BSc (Hons) Geology; MSc Mineral Exploration; GDE Mining Engineering; Pr Sci Nat, FSAIMM (702861); FGSSA	32
Richard Butcher ² CEng reg. number – 438305 AusIMM 211182	Executive Vice-President and Head of Group Technical Services	MSc Mining Engineering; CEng; FAusIMM (CP); MIMMM; MSAIMM	38
Winfred Assibey-Bonsu ^{1, 3} Number 400112/00	Group Geostatistician and Evaluator	BSc (Mining); PhD (Eng); EDP Wits Business School; FSAIMM (700632)	32
Malcolm Thomas ² Number 204703	Group Geologist	BSc (Hons) Geology; MSc Geology; BCom (Hons); MAusIMM; MAIG	31
Andre Badenhorst ² AusIMM 309882	Group Manager: Survey and Planning	NHD (Mine Survey); MAusIMM	38
Heinrich Schnetler ⁴ Number 1467	Group Manager: Survey and Planning (Retired October 2018)	NHD (Mine Survey); GDE (Mining Engineering); MSCC; MIMSSA	42
Peter Andrews ² AusIMM (CP) 302255	Vice-President: Group Head of Geotechnical	BSc (Hons) Geology and Geophysics; MEngSci (Geomechanics); MAusIMM	22
Kate Sommerville ² AusIMM 110684	Vice-President: Mining	BEng (Geological); GradDip (Mining); MBA; FAusIMM (CP); GAICD	26
Danny Hillier ² AusIMM No. 227106	Vice-President and Group Head of Metallurgy	BEng (Chemical); FAusIMM CP (Metallurgy)	28
Matthew Hochen	Vice-President: Capital Projects	BEng (Elec)	21
Pieter Coetzee	Vice-President and Head of Finance: Operations	BCom Internal Auditing; Mining Taxation	24

¹ Registered SACNASP members

² Registered AusIMM members

³ Registered SAIMM members

⁴ Registered IMSSA member

⁵ Tim Rowland assumes responsibility for the Company's Mineral Resource and Mineral Reserve process and is satisfied that the Competent Persons in all regions have fulfilled their responsibilities



Introduction and group overview continued

Assessment and reporting criteria

The assessment and reporting criteria as outlined in the SAMREC Code have been used in the preparation of an internal Competent Person Report (CPR) or PFS document for each operating asset and major growth project, from which the numbers stated in this report were drawn. The CPR principally comprises a technical review of the Mineral Resources and Mineral Reserves, together with a techno-economic appraisal of the relevant mining, processing assets

and LoM plan. Each item under Table 1 of the code has been considered using the 'if not, why not' principle and any material year-on-year variance is explained in this document. This report is in effect a summary of all the individual CPRs as submitted and kept on record.

Metal prices and exchange rates

The table below summarises the metal price deck approved by Gold Fields for the December 2018 Mineral Resource and Reserve estimate and

which is in accordance with the SEC's three-year trailing average gold price to December 2018. The copper price is flexed US\$2.5/lb for 2019 and US\$2.8/lb from 2020 onward. The strategic positioning of the operations to be cash-generative at gold prices periodically trading lower is central to the phasing of the LoM plans. The December Mineral Resource prices have a premium of approximately 15% over the Mineral Reserve prices.

Commodity	unit	December 2018		December 2017	
		Reserve	Resource	Reserve	Resource
Au	US\$/oz	1,200	1,400	1,200	1,400
	A\$/oz	1,600	1,850	1,600	1,850
	ZAR/kg	525,000	600,000	525,000	600,000
Cu	US\$/t	5,510 – 6,170	7,050	5,510 – 6,170	7,050
	US\$/lb	2.5 – 2.8	3.2	2.5 – 2.8	3.2
Ag	US\$/oz	17.5	20	17.5	20

THE FOLLOWING EXCHANGE RATES WERE USED FOR PLANNING PURPOSES, WITH THE COMPARATIVE HISTORIC RATES:

Exchange rate		Dec 2017	Dec 2018	Dec 2018
		(actual)	(actual)	(plan)
	ZAR/US\$	13.33	14.63	13.61
	ZAR/A\$	10.20	10.29	10.20
	US\$/A\$	0.77	0.70	0.75

Risks to the metal price assumptions used include, but are not limited to adverse legislation or poor policies implemented by governments in operating regions, slow global growth, exchange rate volatility and international policies.

Mineral Resource tonnages and grades are estimated in situ over a minimum mining width, and may include mineralisation below the selected cut-off grade to ensure that the Mineral Resources comprise practical mining blocks of adequate size and continuity. Measured and Indicated Mineral Resources are

reported inclusive of those Mineral Resources modified to produce Mineral Reserves. Mineral Resources are estimates, being dependent on interpretation of limited information about the location, shape, and continuity of the occurrence and available sampling results. As the understanding of the ore body improves and the methods and modifying factors that determine its extraction criteria gain increased resolution, the estimates may also change and the Mineral Resource and Mineral Reserve data modified accordingly.

The Mineral Reserve is that portion of the Mineral Resource, which technical and economic studies have demonstrated can justify extraction at the time of disclosure (to a minimum of a PFS level). Estimates of tonnages and grades quoted as Mineral Reserves include allowances for all mining dilution, all other mining factors (modifying factors) and are consequently reported as net tonnes and grades delivered to the mill.

Additional key criteria are as follows:

- The LoM plan is underpinned by a full mine design and production schedule using appropriate proprietary software. Of importance is the utilisation of historically achieved data to inform productivity and processing rates, modifying factors and operating costs. The resultant LoM plans are net present value (NPV) positive with FCF margins broadly aligned to the company strategy
- All Group operations have tailings management plans in place that meet Company standards and provide adequate capacity for the LoM, including closure and post-closure management plans. In total, our operations have 33 TSFs, of which 14 are active and one under construction. Gold Fields only has three sites where upstream tailings are being used (South Deep, Tarkwa and Granny Smith). All three have either clay or high density polyethylene linings. Downstream tailings, where the successive raising of the embankment positions the fill and crest of the TSF further downstream, are used for all other facilities
- The Group's underground Mineral Reserves are classified as being above existing infrastructure. This is in line with international practice, where Reserves are continually accessed via ramps for which the planned expenditure has been provided for in the LoM
- Although all permitting may not be finalised, there is no reason to expect that these will not be granted based on existing processes and protocols. However, the duration taken for final approval may impact the production schedules
- Open pit Mineral Resources are confined to pit shells that are defined by the price, costs and relevant modifying factors used for their estimates. These pit shells are used to constrain the mineralisation to that which is economically and practically extractable under assumed economic conditions
- Underground Mineral Resources are typically confined using Mineable Shape Optimiser (MSO), which assists with generating optimised stope designs to maximise the volume of recovered ore within the given ore body and design constraints, including minimum mining widths and mining cut-off grades
- All regions and operations have documented the assumptions, inputs and modifying factors that underpin the LoM plans, which are supported by mine designs and schedules
- Caution should be exercised when interpreting the grade-tonnage curves provided within this report. The ability to high-grade (selectively mine) the deposits may be precluded by the deposit geometry, mining method and the need for practical development of the ore body
- Operations are entitled to mine all declared material located within their respective mineral rights and/or mining rights, and all necessary statutory mining authorisations and permits are in place or have reasonable expectation of being granted
- Power and utility cost escalation and fuel prices have been factored into all financial models
- Estimated closure plan and rehabilitation costs have been included in all financial models
- All financial models are based on existing tax laws as at 31 December 2018
- This Supplement (this report) contains information as at 31 December 2018 (the effective date of this report). The statements and information set out in this report pertain only to the effective date of this report. Shareholders and affected parties are therefore urged to review all public disclosures made by Gold Fields after the effective date of this report, as some of the information contained in the report may have changed or been updated

Quality assurance and quality control

In accordance with the SAMREC Code, a comprehensive quality assurance and quality control (QA/QC) protocol is in place at all the Gold Fields operations and projects. It draws on industry-leading practice for data acquisition and utilises national standards authority accredited laboratories (e.g. South African National Accreditation System (SANAS) in South Africa), which are regularly reviewed both internally and externally. Analytical QA/QC is maintained and monitored through the submission of blanks, certified reference material and duplicates, plus umpire laboratory checks.



Introduction and group overview continued

Auditing and risk

This December 2018 declaration aims to report on information that is rated as important for disclosure on Mineral Resources and Mineral Reserves and it reflects a level of detail required for completeness, transparency and materiality in reporting. Gold Fields' Mineral Resource and Mineral Reserve estimates are reviewed on an ongoing basis by an internal CP team administered by Corporate Technical Services and cyclically by external and independent experts.

Gold Fields follows an embedded process of third-party reviews to provide expert independent assurance regarding the Mineral Resource and Mineral Reserve estimates and compliance to the appropriate reporting codes.

In 2018, the following operations were subject to external review in line with the Gold Fields policy that each operation or material project will be reviewed by an independent third-party on average once every three years:

- Tarkwa and Damang Mineral Resource reviewed by Snowden and the Mineral Reserve by Optiro
- South Deep Mineral Resource and Mineral Reserve reviewed by SRK
- Salares Norte Mineral Resource and Mineral Reserve reviewed by Optiro

Certificates of compliance have been received from all companies that conducted the external reviews, which state that the Mineral Resource and/or Mineral Reserve have been stated in accordance with the SAMREC Code and there are no

material issues identified in the estimation processes and LoM plans. Importantly, third-party audits are also configured to assist with continuous improvement regarding Resource and Reserve estimation and reporting.

External auditor's certificates of compliance



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27 February 2019 Our Ref: J2343 & J2344

Mr Tim Rowland
Vice President – Geology and Group Planning
Gold Fields Limited
140 Helen Road, Sandton
2196, Johannesburg
South Africa

Dear Mr Rowland

INDEPENDENT MINERAL RESOURCE AND RESERVE AUDIT – SALARES NORTE GOLD-SILVER PROJECT

Optiro has carried out an independent audit of the Mineral Resources and Mineral Reserves at the Gold Fields Salares Norte Project in Chile during December 2018 and January 2019.

Optiro has examined the Statement of Mineral Resources and Mineral Reserves as at 31 December 2018. Optiro declares that the Mineral Resources and Mineral Reserves have been reported in accordance with current international reporting codes, specifically the SAMREC Code (2016), Section 12 of the JSE Listing Rules and the requirements of the US Securities and Exchange Commission (SEC).

The resource audit was carried out by Ian Glacken and the reserve audit was carried out by Andrew Grubb, both of whom have sufficient qualifications and experience to qualify as Competent Persons for this style of mineralisation under the SAMREC Code (2016).

Yours sincerely
OPTIRO



Ian M Glacken FAusMM (CP), FAIG, CEng
Director of Geology



Andrew Grubb FAusMM
Director - Mining

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6 March 2019

Tim Rowland
Gold Fields Limited
50 Helen Road, Sandown, 2031
Sandton, South Africa
Via email: tim.rowland@goldfields.co.za

Dear Tim

RE: Compliance Statement – Tarkwa Gold Mine and Damang Gold Mine

Compliance Statement – Tarkwa 2018 Mineral Resource Estimate

Snowden Group (Snowden) has completed a review of the 2018 Tarkwa Mineral Resource Estimation and finds the following:

- The MRE was completed to an appropriate technical standard
- There was no material technical non-compliance identified
- The MRE process adopted is suitable for reporting to SAMREC Code 2016 and JSE Section 12.

Compliance Statement – Damang 2018 Mineral Resource Estimate

Snowden Group (Snowden) has completed a review of the 2018 Damang Operations Mineral Resource Estimation and finds the following:

- The MRE was completed to an appropriate technical standard
- There was no material technical non-compliance identified
- The MRE process adopted is suitable for reporting to SAMREC Code 2016 and JSE Section 12.

Kind Regards



Jacqui Coombes
Innovation Manager
Snowden Mining Industry Consultants Pty Ltd
Email: jacqui.coombes@snowdengroup.com
Ph: +61 8 9213 9213

Snowden Mining Industry Consultants Pty Ltd ABN 99 085 319 562



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27 February 2019 Our Ref: J2340

Mr Tim Rowland
Vice President – Geology and Group Planning
Gold Fields Limited
140 Helen Road, Sandton
2196, Johannesburg
South Africa

Dear Mr Rowland

INDEPENDENT MINERAL RESERVE AUDIT – DAMANG AND TARKWA MINES

Optiro has carried out independent audits of the Mineral Reserves at the Gold Fields Damang and Tarkwa Mines, Ghana during January 2019.

Optiro has examined the Statement of Mineral Reserves as at 31 December 2018. Optiro declares that the Mineral Reserves have been reported in accordance with current international reporting codes, specifically the SAMREC Code (2016), Section 12 of the JSE Listing Rules and the requirements of the US Securities and Exchange Commission (SEC).

The reserve audit was carried out by Andrew Grubb, BEng (Mining), FAusMM, Director - Mining at Optiro, who has sufficient qualifications and experience to qualify as a Competent Person for this style of mineralisation under the SAMREC Code (2016).

Yours sincerely
OPTIRO



Andrew Grubb
Director - Mining

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27 February 2019

GFA035

Tim Rowland
Vice President - Geology and Group Planning
Gold Fields Limited
150 Helen Road
Sandown, 2031 Sandton
South Africa

Compliance Statement – South Deep Operations

SRK Consulting (Australasia) Pty Ltd (SRK) has completed a review of the South Deep Mineral Resource, Mineral Reserve and Life of Mine Plan and finds the following:

- the work audited was compliant to SAMREC Code (2016) and JSE Section 12
- The work was completed to an appropriate technical standard
- There was no material technical non-compliance identified.

Yours sincerely
SRK Consulting (Australasia) Pty Ltd



Mark Wanless
Principal Consultant (Geology)



Gary Foxleitner
Principal Consultant (Mining)

SRK Consulting (Australasia) Pty Ltd
ABN 56 074 271 720
Trading as SRK Consulting



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GFA035_Compliance Statement - South Deep Operations_RevA

Introduction and group overview continued

Innovation and technology

A Group-wide I&T strategy, underpinned by a five-year implementation plan, is now in place with the aim of supporting the company's strategy by enhancing safety, production volumes and cost metrics through a staged process of modernisation, integration, optimisation and automation. This will be achieved by following the I&T road map as illustrated below, which is based on achieving of the three I&T Horizons focusing on the delivery of five strategic pillars which constitute the new operating platform environment:

FIVE STRATEGIC PILLARS – ROAD MAP SEGMENTS AND GOALS

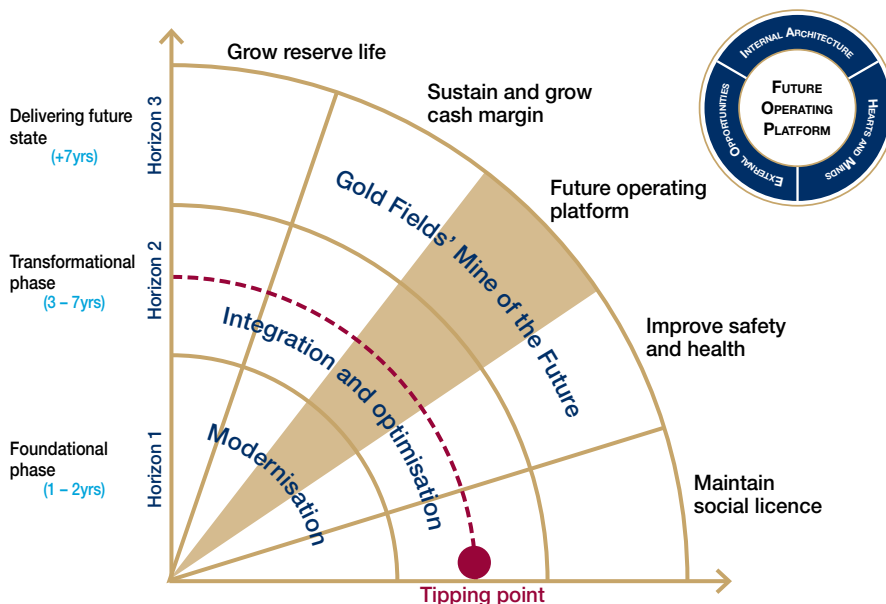
Strategic pillars	Objectives
Grow Reserve and mine life	Halve discovery costs and cycle time from discovery to development handover.
Sustain and grow cash margin	Improve operational efficiencies to sustain cash margin through the use of automation, information, integration and innovation.
Future operating platform	A fully connected mine with a manufacturing culture of collaboration and innovation with appropriate automation.
Improve safety and health	Distance people from active mining areas.
Maintain social licence	Halve mining waste/tailings and diesel particulate matter emissions by 2026.

To achieve the Company's 'Mine of the Future' strategic goal, there are three distinct phases required to be successfully implemented at relevant sites. This will allow for the sustainable progression of the programme and processes into the future. This framework for I&T deployment is grouped into the following areas and portrayed in the schematic below:

- Horizon 1 – Foundational and Modernisation phase over the one to two-year period of implementation. Therefore, the key driver is to visualise operations and collect data
- Horizon 2 – Transformational phase which includes the integration and optimisation of processes and systems over a three to seven-year period of implementation. If this horizon is successfully executed

and imbedded, a tipping point is achieved which will ensure sustainability and delivery of future programmes (i.e. Horizon 3)

- Horizon 3 – Mine of the Future, delivering the future state of the Company over a period of seven years plus



Social and regulatory licence to operate

An important aspect of the mining business that underpins the integrity of the LoM plans and secures the viability of the Reserves is the impact on the countries and communities in which we operate. The implementation of sustainable development policies, including proactive stakeholder engagement strategies, continues to be key in reporting sustainable Mineral Reserves.

All operations are developing and implementing programmes to ensure security of energy and water supply at competitive costs while also focusing on improving energy efficiency, reducing energy costs, carbon footprint and freshwater use,

while increasing recycling and reuse of water. A greater use of renewable energy generation over the LoMs is a key commitment. While opportunities are greatest in new projects, operating mines, notably Agnew and Granny Smith, have recently announced investments in renewables.

Responsible environmental management remains central to the Group's regulatory and social licence to operate. Integrated mine closure plans provide appropriate cost parameters for operational planning as well as end-of-life mine closure commitments.

Tenure over land, shared value with communities, mining, prospecting and environmental permits are in

good standing. Our shared value approach includes giving focused attention to maximising the proportion of our workforce that we draw from host communities and the goods and services we procure from these communities.

The top five Group sustainability topics are listed here and further information on how they are being advanced can be referenced in the accompanying IAR:

- Energy (IAR p70)
- Climate change (IAR 97)
- Integrated mine closure (IAR p105)
- Water management (IAR p100)
- Social and community affairs (IAR p111)



A nighttime photograph of an industrial facility, likely a mining or processing plant. The scene is illuminated by numerous bright lights, creating a high-contrast environment against the dark sky. In the foreground and middle ground, there are large, cylindrical storage tanks, complex scaffolding structures, and various pipes and walkways. The ground appears to be a mix of dirt and gravel. The overall atmosphere is one of active industrial operations.

Americas region

The significant life extension to 2030 at Cerro Corona last year has been re-enforced by further studies in 2018 that will result in completion of a feasibility study (FS) in H1 2019.

The Salares Norte project has finalised an FS study underpinning the maiden Mineral Reserve.

AMERICAS REGION SALIENT POINTS

Mineral Resources

6.2Moz gold, 43.7Moz silver and 848Mlb copper

MINE:

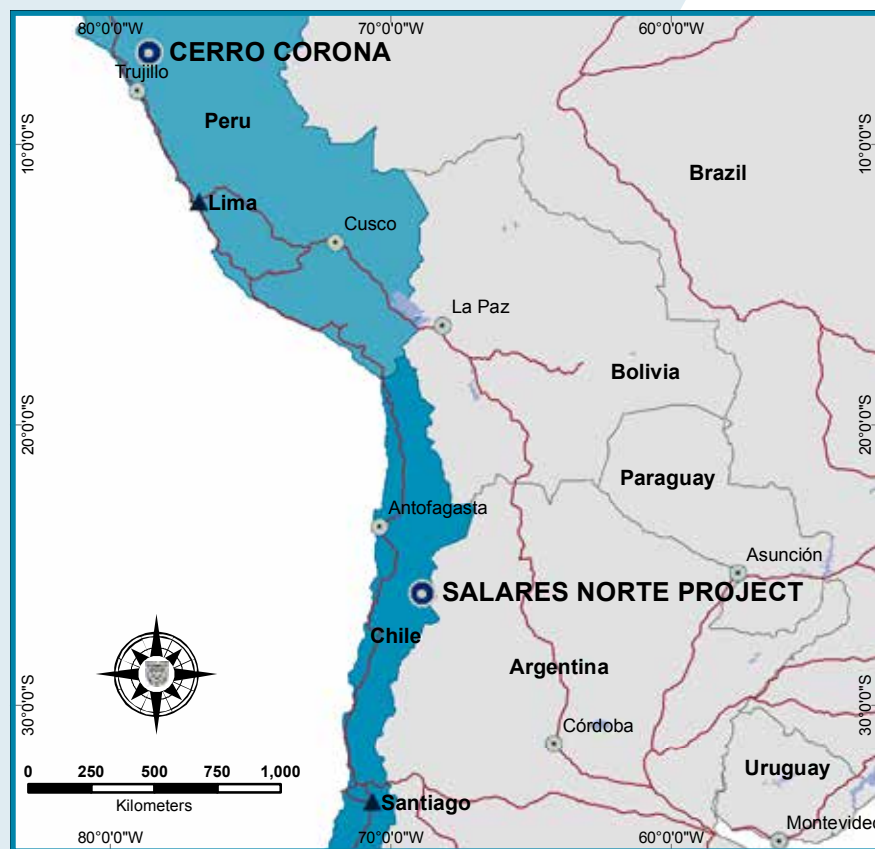
Cerro Corona – Peru
(99.53% attributable to Gold Fields)

Mineral Reserves

5.2Moz gold, 39.3Moz silver and 695Mlb copper

PROJECT:

Salares Norte – Chile
(100% attributable to Gold Fields)



KEY FEATURES

	Cerro Corona	Salares Norte*
Mining method	Open pit	Open pit
Infrastructure	One open pit. One standard sulphide flotation plant with a capacity of 6.9Mtpa	Open pit with combined counter-current decantation, Merrill-Crowe and Carbon in Pulp (CIP) processing at 2Mtpa. Dry-stack tailings disposal
Mineralisation style	Porphyry (Cu-Au)	High-sulphidation epithermal (Au-Ag)
Mineralisation characteristics	<ul style="list-style-type: none"> Mineralisation hosted by a sub-vertical cylindrical shaped diorite porphyry Copper-gold mineralisation conforms to classic porphyry vein definition Mineralisation zones discontinuous with mid-range predictability 	<ul style="list-style-type: none"> Gold mineralisation is hosted by intensely silica and alunite altered and oxidised rocks. Most mineralisation occurs in breccia rocks formed by explosive volcanism Gold is the primary economic metal with silver having secondary importance

* Salares Norte key features established by the FS completed in H1 2019

Americas region continued

Regional overview

The Cerro Corona mine is located in northern Peru on the eastern slope of the western mountain range of the Andes. The copper-gold deposit exhibits a typical porphyry style of mineralisation and is situated within the Hualgayoc mining district in the northern part of the Cajamarca province. This metallogenic province hosts prolific epithermal-, porphyry- and polymetallic-style mineralisation. The mining area is characterised by moderate to reasonably steep mountainous terrain with elevations ranging from approximately 3,600m to 4,000m above mean sea level (amsl).

The Salares Norte project is located in northern Chile's Atacama region, along the northern Andes range. The northern Andes of Chile are known for Porphyry gold-copper and epithermal gold-silver deposits. These are located along the Maricunga metallogenic belt.

Regional geology

The Cerro Corona copper-gold porphyry is one of 14 known Tertiary aged porphyry Cu-Au-Mo deposits and 19 epithermal Au-Ag deposits located in the Cajamarca metallogenic province (CMP) of northern Peru. There are two well-mineralised districts within the CMP. These are the Yanacocha district in the south of the province, which is host to what once was the largest producing gold mine in South America. The other is the Hualgayoc mining district in the north, which is one of the oldest mining districts in Peru and is best known for its historic silver production and more recent base metal production.

This well-known district has been an important silver producing area since Inca times, with more than 50Moz of silver and significant amounts of lead, zinc and copper produced from vein and manto-type deposits since the Spanish conquest in the 16th century. The Hualgayoc mining town was established in 1771. The regional structure is characterised by large open folds of Cretaceous-aged sedimentary units, predominately

limestones, with axial planes striking approximately 315° and steep SW dips. Faulting is generally restricted to normal and oblique slip faults with offsets of a few metres to tens of metres.

The Salares Norte deposit is located in Chile in the Western Cordillera, next to the limit with the Puna province. The topography and surrounding geology are typical of the Puna environment, which is characterised by closed basins discharging surface water into salt flats (salares in Spanish), an elevated plateau with elevations above 3,600m amsl and widespread Upper Tertiary and Quaternary volcanism. The arid climate and consequent low erosion has preserved much of the original volcanic landforms.

Salares Norte is near the southern end of South America's Central Volcanic Zone (CVZ). The CVZ is a long belt of Quaternary volcanoes extending from 16°S in southern Peru to 27°S in the Ojos del Salado/Tres Cruces volcanic complex located along the Chile-Argentina border.

The deposit lies at the northernmost end of the Maricunga metallogenic belt as it was originally defined, extending from 26 to 28°S. The Maricunga is a large belt, more than 200km long and 35km wide, characterised by Late Oligocene-Early Miocene and Middle Miocene magmatism with associated epithermal (less common) and gold-rich porphyry style (predominant) deposits.

The immediate district surrounding Salares Norte (within a radius of about 30km) is dominated by the presence of Upper Tertiary (Neogene) volcanic and pyroclastic rocks ranging in age from Late Oligocene-Early Miocene to Quaternary. This relatively young, post-Incaic deformation volcanic cover has translated into a relatively smooth topography characterised by the absence of NS trending basement block bounding faults which characterise the Maricunga Belt to the south.

Exploration drilling and expenditure

The Cerro Corona Mineral Resource is defined by approximately 98,000m of exploration drilling. Towards the end of 2018, Gold Fields La Cima (GFLC) had drilled an additional 4,642m of infill diamond drillcore to increase confidence in the definition of the key lithological contacts, reduce local variability related to grade distribution within the five-year mine plan and for hydrogeological management purposes.

At Cerro Corona, the planned exploration drilling for 2019 includes 8,500m of diamond holes for the purposes of geological and economic profiling and condemnation drilling at depth below the current pit. This deep-drilling campaign will test the potential for any further mineable Resource at depth. This is required as input to the life-of-mine (LoM) plan relating to potential in-pit tailings disposal. In addition, Resource definition drilling will be conducted to evaluate the Resources between the Reserve pit and the Resource pit shells at the eastern and southern walls to assess the potential of further pit expansion.

Gold Fields started drilling at Salares Norte in March 2011 with a four-hole, 935m, reverse circulation (RC) programme. The second hole (SNRC002 the discovery hole) intersected gold-silver mineralisation. Follow-up diamond and RC drilling programmes have been carried out during the subsequent field seasons. Through to 30 June 2018, 620 drill holes (169,982m) have been drilled on the Salares Norte project.

The Americas region maintains rigorous quality assurance and quality control (QA/QC) protocols on all its resource definition and exploration programmes. It draws on industry leading practice for data acquisition and utilises accredited laboratories, which are regularly reviewed both internally and externally. Analytical sampling QA/QC is maintained and monitored through the submission of blanks, certified reference material

and duplicates, plus umpire laboratory checks.

The immediate district surrounding the Salares Norte deposit is considered to have good potential to host other epithermal deposits of Miocene age. District-scale

exploration by Gold Fields since 2008 has included geologic mapping, spectral alteration mapping, heli-borne aeromagnetic and radiometric surveys and stream-sediment geochemical sampling. Seven other target areas have been identified within a radius of 20km of Salares

Norte. These are Horizonte, Pedernales-Terrier, Rio Baker, Aster 3, Aster 2, Helada and Mayweather. Target definition work consists of detailed geologic and alteration mapping, grid soil and lag sampling, ground magnetics, CSAMT and IP/ Resistivity geophysical surveys.

The table below indicates drilling completed at Cerro Corona during 2018.

	December 2018		December 2017	
	Metres	Cost (US\$M)	Metres	Cost (US\$M)
Cerro Corona	4,642	1.9		

Mineral Resources and Mineral Reserves

Mineral Resources

The Mineral Resources declared are classified as Measured, Indicated or Inferred, as described in the SAMREC Code. Mineral Resource categories are assigned with consideration given to geological complexity, grade variance, drill hole intersection spacing, and proximity of mining development. The following factors apply to the Mineral Resources reported:

- NSR cut-off grades are calculated for the individual deposits
- Mineral Resources are constrained within a Whittle optimised pit shell, which considered mining, processing and administrative costs, process recovery and sustaining capital
- Mineral Resources are reported in situ for material within a pit shell having positive value after process recovery and costs for processing, refining, royalties, and administrative costs have been applied
- The application of realistic modifying factors to ensure a reasonable prospect of eventual economic extraction

Mineral Reserves

The Mineral Reserve estimates are based on appropriately detailed and engineered LoM plans. All design and scheduling work is undertaken to a suitable level of detail by experienced engineers using appropriate mine planning software. The planning process incorporates realistic modifying factors and the use of appropriate cut-off grades, geotechnical criteria, mining fleet productivities, processing capacities and other techno-economic investigations.

AMERICAS REGION SUMMARY OF THE MINERAL RESOURCE AND MINERAL RESERVE ESTIMATE¹

	Mineral Resources				Proved and Probable	Mineral Reserves			
	December 2018			Dec 2017		December 2018			Dec 2017
Measured, Indicated and Inferred	Tonnes (Mt)	Grade (g/t)	(Moz)	(Moz)		Tonnes (Mt)	Grade (g/t)	(Moz)	(Moz)
Cerro Corona Au	107.7	0.65	2.26	2.54	Cerro Corona Au	79.9	0.68	1.74	1.94
Salares Norte Au	25.6	4.76	3.91	3.66	Salares Norte Au	21.1	5.13	3.48	
Total Au	133.2	1.44	6.17	6.20	Total Au	101.0	1.61	5.22	1.94
Salares Norte Ag²	25.6	53.13	43.66	49.46	Salares Norte Ag²	21.1	57.94	39.26	
	Tonnes (Mt)	Grade (%)	Copper (Mlb)	Copper (Mlb)		Tonnes (Mt)	Grade (%)	Copper (Mlb)	Copper (Mlb)
Cerro Corona Cu²	102.7	0.37	848	917	Cerro Corona Cu²	79.9	0.39	695	767

¹ Managed, unless otherwise stated

– Mineral Resources are inclusive of Mineral Reserves

– All tonnes (t) relate to metric units and rounding-off of figures may result in minor computational discrepancies; where this happens, it is not deemed significant

² Reported tonnes containing gold are consistent for all metals

Americas region continued



Cerro Corona mine



The life extension relies on the utilisation of the mined pit as a new tailings storage facility (TSF), supported by increased tails density plus a 3m raise in the TSF wall height to 3,803m amsl.

Cerro Corona remains highly cash-generative and is positioned as a core franchise asset anchoring the region as it assesses district exploration potential and portfolio growth opportunities.

Asset fundamentals	
General location	The Cerro Corona deposit, centred at longitude 78°37'W and latitude 6°45'S, is at elevations ranging from approximately 3,600m to 4,000m amsl. It is located 1.5km WNW of the village of Hualgayoc, some 80km by road north of the departmental capital of Cajamarca, and approximately 600km NNW of the capital city of Lima.
Licence status and holdings	The mining concessions owned by Cerro Corona cover an area of 4,365ha while the surface rights cover 1,291ha. Cerro Corona is owned by GFLC, which holds 99.53% of the economic interest.
Operational infrastructure and mineral processing	<p>Cerro Corona mine operates one open pit and one copper-gold plant.</p> <p>The processing plant reflects a typical copper flotation plant, with a design capacity of 6.9Mtpa. The crushing plant comprises two jaw crushers in parallel and two Abon Sizers in each line. Crushed product is conveyed to a two-stage grinding circuit consisting of a Semi Autogenous Grind (SAG) mill and a ball mill, in closed circuit with cyclone cluster for classification. Cyclone overflow represents the final milled product and feeds the flotation plant. The rougher flotation produces a bulk concentrate and final tails, which is then reground and sent to cleaner flotation. The cleaner tails go to scavenger flotation, while the concentrate, with a grade of over 20% copper, goes to the next process.</p> <p>The final concentrate is thickened and filtered before being stockpiled for road transport (380km) to the Salaverry port, for shipment to copper smelters in Japan, Germany and Bulgaria. The thickened rougher flotation tails and the tails from the cleaner-scavenger flotation are sent by gravity to the TSF.</p>
Climate	There are no extreme climate conditions that may affect mining operations.
Local geology and deposit type	<p>The Cerro Corona copper-gold deposit is typical of porphyry-style mineralisation comprising stock work quartz-pyrite-marcasite-chalcocopyrite ± bornite ± hematite ± magnetite veining, hosted by intensely altered intrusive lithologies of diorite to dacitic composition. The regional geology of the area is described in the Americas regional section.</p> <p>The deposit consists of an intrusive diorite to quartz-diorite dated at Mid-Miocene age (14.4 ± 0.1Ma). The intrusive is primarily emplaced along sub-vertical faults. Limestone alteration varies from siliceous in the south of the deposit to marbling in the west.</p>
LoM	Based on the PFS and supported by the FS nearing completion, it is estimated that the current Mineral Reserve will be depleted in 2030.
Sustainable development	Cerro Corona maintained its OHSAS18001: 2007 and ISO14001: 2015 certifications. In 2017, GFLC maintained its registration in the Official Register of Good Environmental Practices managed by the environmental regulator (Agency for Environmental Assessment and Enforcement – OEFA).

Americas region continued

Cerro Corona mine continued

Brief history of Cerro Corona

In 1979, exploration identified porphyry-style mineralisation in the Cerro Corona area. During the period 1992 to 1993, sampling by the Gubbins Group identified gold mineralisation in the leached cap of the Cerro Corona deposit. Copper-gold porphyry mineralisation was discovered through the drilling of nine diamond core holes and completion of an exploration adit into the mineralised zone.

From 1994 to 1996, Cerro Corona, then held by Barrick, drilled 140 RC drill holes totalling 9,476m and 118 diamond core holes totalling 35,254m. A draft FS was completed by Kilborn. From 1997 to 1998, RGC Limited drilled six diamond core holes totalling 2,760m and a preliminary FS was completed by Fluor.

In 2001, Minproc completed a number of FS, which ultimately indicated a Mineral Reserve of ~95Mt. In 2003, Gold Fields, through a subsidiary, signed a definitive agreement with Sociedad Minera Corona S.A. for the purchase of the Cerro Corona deposit and adjoining mining concessions.

The Environmental Impact Assessment (EIA) was approved in December 2005 and the purchase transaction for the Cerro Corona project was completed in January 2006. Mine construction commenced in May 2006. Building of the Las Gordas tailings dam and quarrying for the relevant construction material commenced in 2007. The mine has been in production since 2008 and utilises open pit mining and sulphide flotation to produce an auriferous copper concentrate via a flotation circuit.

Gold Fields Corona (BVI) Limited, a wholly owned subsidiary of Gold Fields, increased its economic interest in GFLC from the original 80% to 98.6% in 2012, and in 2013 to 99.53%.

Key developments and material issues

- The PFS, which resulted in a successful extension of Cerro Corona's life to 2030 (as reported last year), has now been further reinforced by an FS that is scheduled for completion in H1 2019
- The FS nearing completion has significantly progressed the level of technical and financial assurance underpinning the LoM plan as well as materially addressing and mitigating risks related to hydrogeology, TSF hydraulic containment, TSF deformation analysis and factors of safety
- The FS retains the previous PFS' key elements including optimisation of the current TSF to 3,803m amsl, an increase in settled slurry density and development of an in-pit TSF (which will require accelerated mining and stockpiling of ore). In addition, a new mining sequence, new pit geotechnical design and optimised waste storage and ore stockpiling capacity are integral to the LoM extension plan
- Hydrogeological studies demonstrate an appropriate hydrogeological containment level for the in-pit TSF to an elevation of 3,710m amsl (~30m above final tailing depositional model design)
- There is a phased process in place to submit and secure approvals for the relevant permits to underpin the LoM extension project, which will align to the requirements of the FS
- During 2018, a successful mining contractor change was completed, including new mine fleet resulting in a significantly enhanced capacity to increase total tonnes moved
- The sale of the oxide stocks to Tantauatay (BVN) started in January 2018 and will continue in 2019, assisting with releasing real estate for waste storage – nearly 2Mt of oxide was sold in 2018
- 2019's mine plan includes mining and processing a defined section of the ore body, with elevated arsenic grades which decline significantly from 2020. Predicted plant recoveries going forward have taken this into consideration, based upon actual operating experience
- in prior years treating ore from this particular section of the pit. Managed blending at the mine and at the Salavery warehouse will assist in delivering an appropriate final product
- The EIA was submitted to the regulator in December 2018, and the estimated approval of EIA 8 is in June 2019 – with development of EIA 9 in 2020 with scheduled submission to the regulator in 2021
- The LoM extension plan requires longer-term stockpiling of the lower grade ores for processing towards the end of mine life. The potential impact to plant recoveries from partial weathering of this stockpile has been estimated by specific test work and is accounted for in the LoM plan
- A scoping study to investigate the potential to extend life beyond 2030, including the assessment of co-disposal tailings options, will be advanced in 2019.

Operating statistics

		Historic performance		
		Dec 2018	Dec 2017	Dec 2016
	Units			
Open pit mining				
Total mined	kt	21,776	15,744	14,452
– Waste mined	kt	14,922	8,659	7,391
– Sulphide tonnes mined	kt	6,854	7,085	7,061
Strip ratio (waste: ore tonnes)	ratio	2.2	1.2	1.0
Au mined grade	g/t	1.06	1.08	1.05
Cu mined grade	%	0.56	0.49	0.52
Processing				
Sulphide tonnes treated	kt	6,644	6,796	6,977
Au head grade	g/t	1.07	1.08	1.03
Cu head grade	%	0.57	0.52	0.53
Produced				
Concentrate produced	kt	159	153	156
Au sold	koz	141.0	164.7	149.1
Cu sold	kt	30.7	30.4	29.9
Au equivalent oz sold	koz	299.1	313.8	268.9
Plant recovery factor (Au) ²	%	68.1	70.4	67.5
Plant recovery factor (Cu)	%	88.0	89.0	86.6
Financials				
Average Au price received	US\$/oz	1,272	1,255	1,247
Average Cu price received	US\$/lb	2.97	2.78	2.2
Cost of sales before amortisation and depreciation	US\$M	154.8	154.3	140.0
	US\$/oz	518	492	518
Capital expenditure (capex)	US\$M	33.2	34	43
	US\$/oz	111	108	160
All-in sustaining cost (AISC) ¹	US\$/oz	282	203	499
LoM				
Mineral Reserves	Mt	79.9	86.2	46.1
Mineral Reserves Au Head Grade	g/t	0.68	0.70	0.88
Mineral Reserves Cu Head Grade	%	0.39	0.40	0.45
Mineral Reserves – Au	Moz	1.7	1.9	1.3
Mineral Reserves – Cu	Mlb	695	767	456

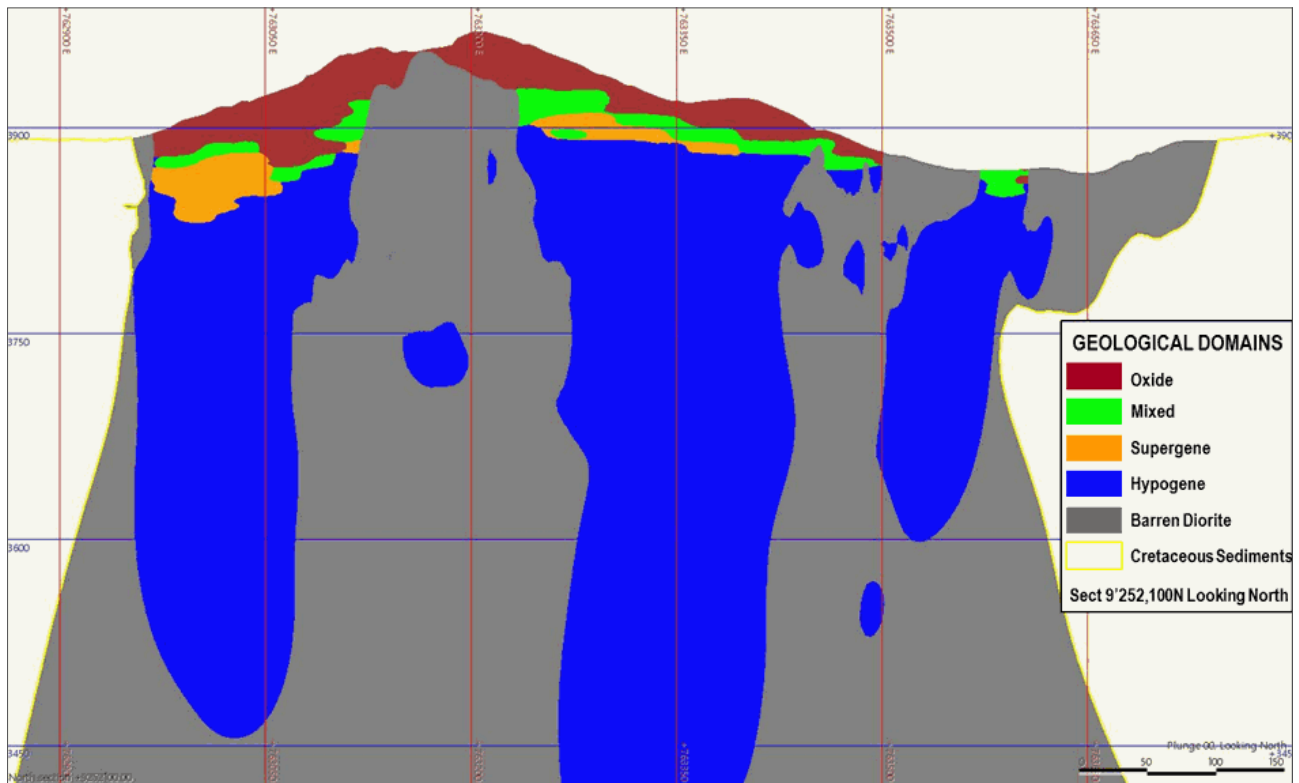
¹ AISC and AIC calculated according to World Gold Council standard, with copper revenue treated as a by-product. Rounding off of figures presented in this report may result in minor computational discrepancies. Where this occurs, it is not deemed significant

² Some transitional material processed with hypogene ore in 2016

Americas region continued

Cerro Corona mine continued

WEST-EAST SECTION SHOWING OXIDATION STATUS OF GEOLOGICAL DOMAINS



Mining

The Cerro Corona deposit is mined by conventional surface open pit mining methods. The final surface mine area is expected to cover some 1,100m x 1,100m. The mining operation will extend from the crest of the original Cerro Corona hill, which peaked at 3,964m amsl, to a final depth at around 3,464m amsl.

Mining methods

The current mining operation using open pit methods will be continued on a similar basis utilising the newly transitioned mining contractor. The material movement rate in the new LoM 2030 is variable over the mining schedule and therefore a mining contractor with the ability to mobilise and demobilise additional equipment and personnel offers advantages over an owner-mining alternative. Mining benches are all 10m high and haul roads have a maximum gradient of

10%. All mined material requires drilling and blasting, utilising blast holes with a diameter of 200mm and applying variable powder factors according to rock hardness.

Mine planning and scheduling

Cerro Corona's LoM plan is based on detailed and well informed geological and resource block models. The LoM plan is established from detailed short- and long-term mine design and production schedules, based on reliable production rates and well defined modifying factors. Planning utilises specialised mine planning software and a customised LoM resource estimation model known as the localised multivariate uniform conditioning model, which uses specialised geostatistical software. This is supplemented by a high resolution 'three bench' shorter-term resource model to inform short- to medium-term mine planning.

Innovation and technology

Cerro Corona will continue to fully implement digital mining in 2019 including the following:

- Full dispatch implementation with new mining fleet
- Deployment of an anti-fatigue management system
- Drones for security, topography and site mapping
- Installation of a vehicle proximity detection system and vehicle collision avoidance system
- Centralised geotechnical monitoring system
- Remote pumping control system at the external ponds to reduce risk of unauthorised discharges

Mineral Resources and Mineral Reserves

The Resource and Reserves are based on the 2017 geological and long-term Resource block models as well as the 2017 geotechnical model, which are all incorporated into the PFS and FS.

The Mineral Resources are reported at a net-smelter return (NSR) cut-off of US\$14.25/t and Mineral Reserves are reported at NSR cut-offs ranging from US\$14.25/t to US\$18/t and constrained within an optimised pit shell, based on the relevant economic parameters and modifiers. The Mineral Reserves are constrained by

the total capacity of the upgraded TSF of 102Mt (47Mt post December 2018), the total in-pit TSF capacity of 31.2Mt and the confirmed waste storage facility (WSF) volumes.

The LoM capital costs consist predominantly of TSF wall raising and seepage control measures (containment blankets), WSF expansion and a water treatment plant.

Mineral Resources

The Mineral Resource estimates are classified as Measured, Indicated and Inferred as described in the SAMREC Code. Mineral Resource categories

are assigned with consideration given to geological complexity, grade variance, drill hole spacing and mine development, and are reported as in situ within a pit shell. The geological model is based on lithology, mineralisation, alteration, and structure using information from exploratory and infill drill holes, blast holes and in-pit mapping. The long-term resource model is based on exploration and resource drilling data. The medium-term model, which covers three benches, uses a combination of drill holes and blast holes, and is projected three benches below the mined pit surface.

MINERAL RESOURCE CLASSIFICATION

Gold	Tonnes (kt)			Grade (g/t)			Au (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open Pit									
Measured	52,623	59,760	59,587	0.73	0.75	0.82	1,229	1,442	1,577
Indicated	42,856	41,000	24,689	0.49	0.49	0.56	674	652	446
Inferred	3,119	3,290	2,352	0.42	0.43	0.57	42	46	43
Total open pit	98,597	104,050	86,629	0.61	0.64	0.74	1,945	2,140	2,066
Surface									
Oxides Measured	5,239	7,114	7,112	1.29	1.32	1.32	217	301	301
Sulphide Measured	3,822	3,823	3,823	0.82	0.82	0.82	101	101	101
Total surface	9,061	10,937	10,935	1.09	1.14	1.14	318	402	402
Grand total	107,658	114,986	97,564	0.65	0.69	0.79	2,263	2,542	2,468

Copper	Tonnes (kt)			Grade (%)			Cu (Mlb)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit									
Measured	52,623	59,760	59,587	0.40	0.41	0.42	460	538	557
Indicated	42,856	41,000	24,689	0.36	0.36	0.39	338	328	215
Inferred	3,119	3,290	2,352	0.33	0.36	0.35	23	26	18
Total open pit	98,597	104,050	86,629	0.38	0.39	0.41	821	892	790
Surface									
Measured	4,064	3,823	3,823	0.30	0.30	0.30	27	25	25
Grand total	102,661	107,873	90,452	0.37	0.39	0.41	848	917	815

Modifying factors

- The Measured and Indicated Mineral Resources are inclusive of Mineral Reserves
- Mineral Resources and Mineral Reserves are quoted as at December 2018
- Mineral Reserves are quoted in terms of run-of-mine (RoM) grades and tonnages as delivered to the metallurgical processing facility and are therefore fully diluted
- Mineral Reserve statement includes only Measured and Indicated Mineral Resources, modified to produce Mineral Reserves and contained within the LoM plan
- Mineral Resources and Mineral Reserves undergo internal audits during the year and any issues identified are rectified at the earliest opportunity – usually during the current reporting cycle

Americas region continuedCerro Corona mine continued

	Units	December		
		2018	2017	2016
Mineral Resource parameters				
Mineral Resource Au price	US\$/oz	1,400	1,400	1,400
Mineral Resource Cu price	US\$/lb	3.2	3.2	3.2
NSR for mill feed ¹	US\$/t	14.25	14.75	16.59
Au Cut-off for oxide ore	g/t	0.4	0.4	0.4
Mineral Reserve parameters				
Mineral Reserve Au price	US\$/oz	1,200	1,200	1,200
Mineral Reserve Cu price ³	US\$/lb	2.8	2.8	2.8
NSR for mill feed ²	US\$/t	18	18	16.59 – 22.00
Strip ratio (waste:ore)	ratio	0.94	1.04	0.94
Dilution open pit	%	0	0	0
Mine Call Factor (MCF)	%	100	100	100
Mining recovery factor (open pit)	%	98	98	98
NSR	US\$/t	14.25	14.75	16.59
Plant recovery factor (Au) – Hypogene ^{1,3}	%	69.5	69	69
Plant recovery factor (Cu) – Hypogene ^{1,3}	%	86.5	87	87
Processing capacity	Mtpa	6.9	6.9	6.8

¹ At December 2018 approximately 99% of remaining in-pit ore consists of hypogene material

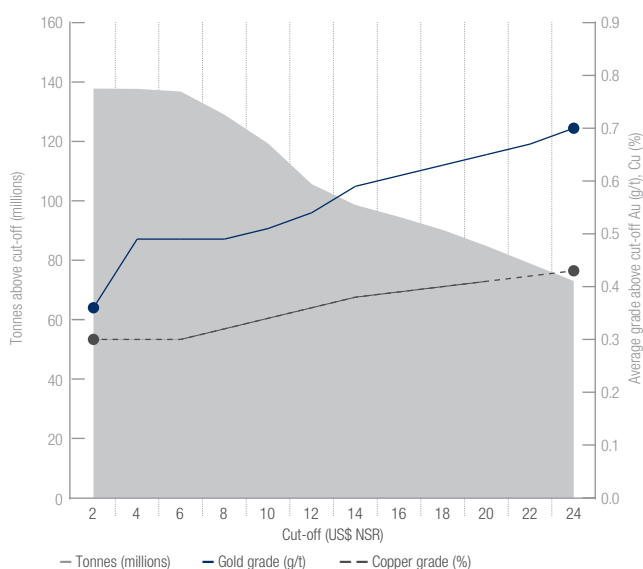
² NSR is defined as the return from sales of concentrates, expressed in US\$/t, i.e.: $NSR = (Au\ price - Au\ selling\ cost) \times Au\ grade \times Au\ recovery + (Cu\ price - Cu\ selling\ cost) \times Cu\ grade \times Cu\ recovery$. A variable NSR is applied to the LoM plan to optimise the NPV and FCF

³ For revenue estimation a forward Cu price of US\$2.5/lb for 2019, thereafter US\$2.8/lb was utilised

Grade tonnage curve

Grade tonnage curves for sulphide Mineral Resources (open pit) are presented below.

Grade tonnage curve (sulphides) – Open pit



Mineral Reserves

The Mineral Reserve estimate for Cerro Corona is based on a suitably detailed and engineered LoM plan. All design and scheduling work is undertaken to an appropriate level of detail by experienced engineers using specialised mine planning software. The planning process incorporates relevant modifying factors and realistic production and processing

rates supported by an NSR cut-off and other techno-economic investigations, including pit staging, geotechnical domain modelling and hydrogeological studies. Appropriate LoM sustaining capital is incorporated in the cash-flow model to underpin the Mineral Reserve. Low-grade stockpile material, that is value accretive, is scheduled for treatment at the end of the LoM.

The 2018 operating results show the gold and copper head grades tracking marginally above the reported LoM Reserve grade, which is a result of short- to medium-term mining mix and ore blending to optimise the recovery of gold and copper.

MINERAL RESERVE CLASSIFICATION

Gold	Tonnes (kt)			Grade (g/t)			Au (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Classification									
Open pit									
Proved	45,864	52,365	33,480	0.77	0.79	0.96	1,141	1,337	1,033
Probable	29,961	30,004	8,809	0.51	0.52	0.59	490	500	168
Total open pit	75,825	82,369	42,289	0.67	0.69	0.88	1,631	1,837	1,201
Surface									
Sulphide Measured	4,064	3,823	3,823	0.81	0.82	0.82	106	101	101
Grand total	79,889	86,191	46,112	0.68	0.70	0.88	1,737	1,937	1,302

Copper	Tonnes (kt)			Grade (%)			Cu (Mlb)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Classification									
Open pit									
Proved	45,864	52,365	33,480	0.42	0.43	0.48	420	493	351
Probable	29,961	30,004	8,809	0.37	0.38	0.41	247	249	80
Total open pit	75,825	82,369	42,289	0.40	0.41	0.46	667	742	431
Surface									
Measured	4,064	3,823	3,823	0.30	0.30	0.30	27	25	25
Grand total	79,889	86,191	46,112	0.39	0.40	0.45	695	767	456

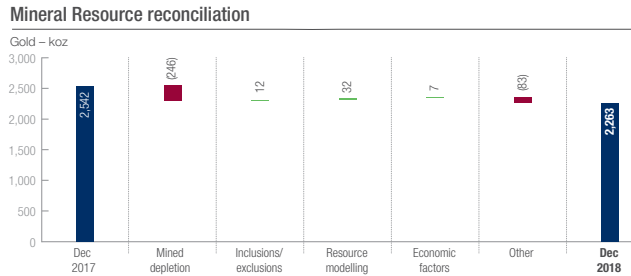
MINERAL RESOURCE AND MINERAL RESERVE RECONCILIATION YEAR ON YEAR

Factors that affected Mineral Resource reconciliation	Factors that affected Mineral Reserve reconciliation
Mining depletion	Mining depletion
Geological and resource model updates	Impact of the updated geological and resource block model
Oxide sale (2.1Mt)	

Americas region continued

Cerro Corona mine continued

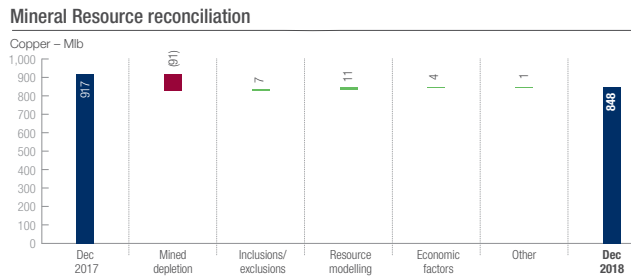
Change in gold Mineral Resources



Change in gold Mineral Reserves



Change in copper Mineral Resources



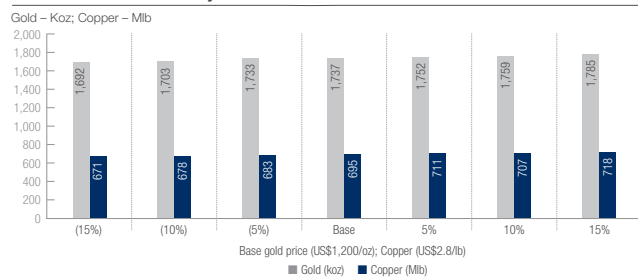
Change in copper Mineral Reserves



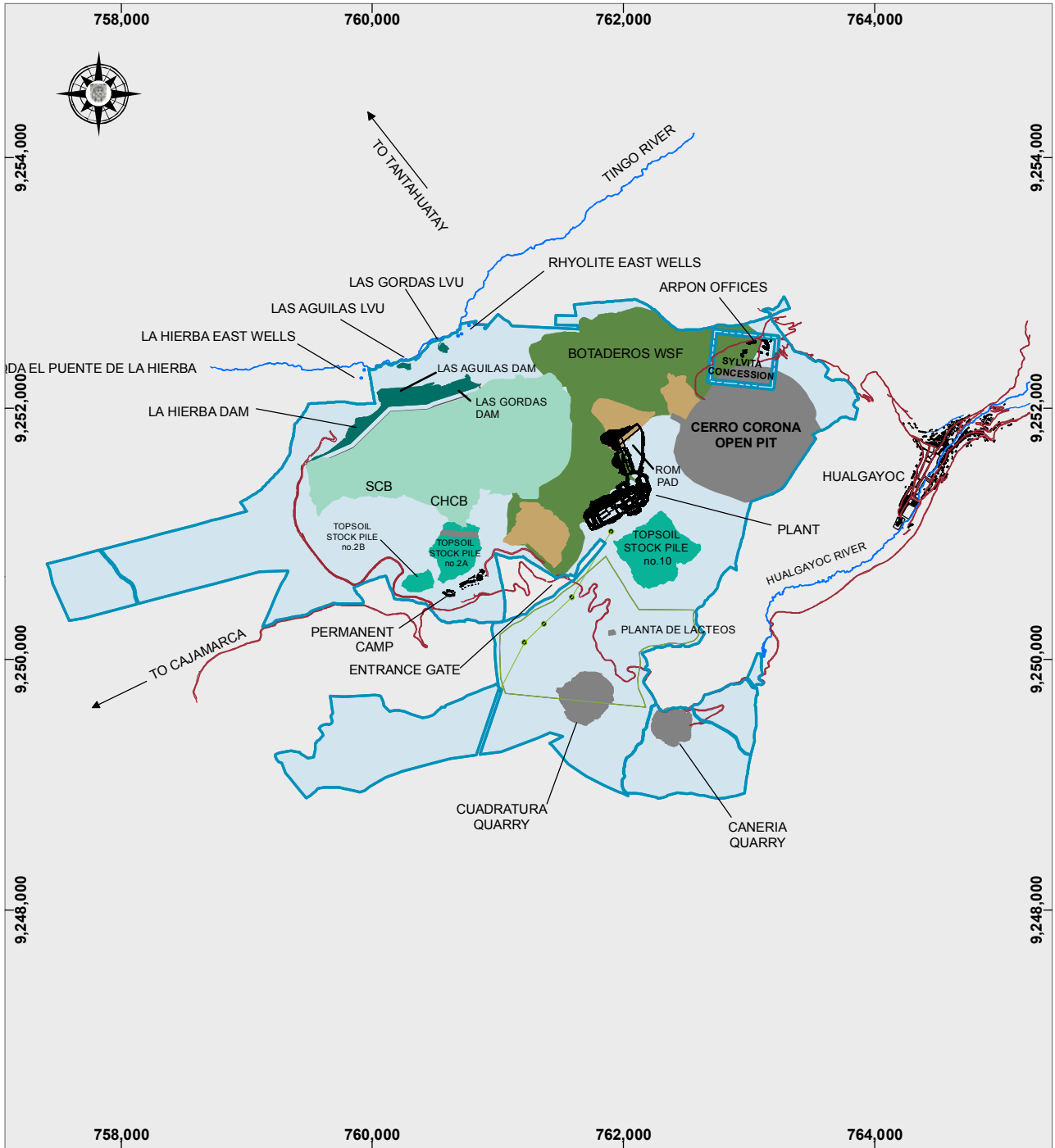
Mineral Reserve sensitivity (gold – koz; copper – Mlb)

The Mineral Reserves are constrained predominantly by the TSF and WSF facilities and are therefore reasonably insensitive to changes in the metal price. Sensitivities are not based on detailed rerun depletion schedules and should be considered on a relative and indicative basis only.

Mineral Reserve sensitivity



MINE SITE INFRASTRUCTURE LAYOUT



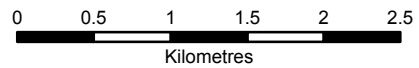
Reference

- Building
- Rivers
- Road
- Power Line
- Property Boundary
- Wells
- Open Pit/Quarry
- Low Volume Underflow (LVU)

- Tailings Storage Facility (TSF)
- Waste Storage Facility (WSF)
- Topsoil Dump
- Stockpile

Gold Fields Limited
Cerro Corona Mine

PLAN SHOWING MINE INFRASTRUCTURE AS AT DECEMBER 2018



Co-ordinate System: WGS 1984 UTM Zone 17S
Projection: Transverse Mercator

Americas region continued

Salares Norte project – 100% attributable to Gold Fields



High-grade, open pit, gold-silver project in Chile discovered by Gold Fields in 2011, now with completed FS.

- Definitive FS (DFS) completed in 2018 and maiden Mineral Reserve reported
- Mineral Resource: 3.9Moz and Mineral Reserve: 3.5Moz gold only; and 4.5Moz and 4.1Moz including silver as gold equivalents

The Salares Norte project includes the Brecha Principal and Agua Amarga deposits – for which a Mineral Resource and Mineral Reserve are declared. The project also includes several early-stage district exploration targets.

A DFS was completed in 2018 based on developing Salares Norte as an open pit mine with combined counter-current decantation (CCD), Merrill-Crowe and CIP processing at an average 2Mtpa plant throughput. The Mineral Reserve is defined as the ore reporting from the mining schedule, with Probable material derived from the Indicated Resource.

Asset fundamentals	
General location	The Salares Norte project is located in the Atacama region of northern Chile. The nearest town is Diego de Almagro, about 190km by road to the west of the project. The project is at 26°01'S, 68°53'W, with elevations between 4,200m and 4,900m amsl.
Licence status and holdings	Minera Gold Fields Salares Norte SpA. (MGFSN), a Gold Fields entity, owns the project. MGFSN holds 1,800ha of exploitation concessions (mining rights), with definitive title granted. MGFSN holds 82,030ha of additional exploration and exploitation concessions in the district surrounding the project. Gold Fields indirectly holds a 100% interest in MGFSN. Access rights to the property have been granted by the government and applications for water rights have been approved.
Operational infrastructure and mineral processing	<p>The Brecha Principal and Agua Amarga deposits will be mined by a contractor using open pit mining methods. Mining will be done in a series of six phases, over nine years including two years of pre-stripping, starting in Brecha Principal and finishing in Agua Amarga. Ultimately the two pits merge into a single pit due to the backslope. Waste will be placed in either the south or north WSF. All ore will be hauled to either the RoM pad or one of the grade-bin stockpiles, south of the pits.</p> <p>The process plant, designed to process 2Mtpa, is located SE of the main pit at around 4,500m amsl. Ore is crushed, milled and thickened, with thickener underflow pumped to cyanide leaching. Slurry from the leaching stage feeds a counter current washing and solid-liquid separation process through a two-stage CCD circuit. Metals in the solution are recovered by zinc precipitation in the Merrill-Crowe process. Tailings slurry obtained from the underflow of the second CCD stage is scavenged by CIP.</p> <p>The dry stack TSF, located above the south mine WSF, has a total capacity of 22.2Mt. It is expected that tailings will come from the filter plant with geotechnical moisture content less than 20%. Filtered tailings will be transported by trucks to the TSF, spread and allowed to dry before being compacted.</p> <p>Infrastructure will consist of mine and plant facilities, camp, offices, on-site power generation and potable water plant. Water will be supplied from a well field, 12km from the project.</p>
Climate	The mine is situated at high altitude, around 4,500m amsl. While winter storms may occur at these elevations, management plans have been established to mitigate any negative impact on mining operations.
Local geology and deposit type	The Salares Norte project is located in the northern part of the Maricunga Belt, an area with a predominance of Cenozoic volcanic rocks, comprised of eroded strato-volcanos, volcanic domes, and pyroclastic rocks. Mineralisation is contained in a high-sulphidation epithermal system, hosted mainly by a breccia complex along the contact of two volcanic domes of andesitic and dacitic composition. Resources and Reserves have been delineated by drilling in two separate deposits, Brecha Principal and Agua Amarga, which are located about 500m apart. Most of the mineralisation known to date is oxidised. The sulphide mineralisation contains mainly pyrite and is generally lower grade, lower volume, and has lower processing recovery than the oxide material.
LoM	Based on the DFS, the mine will operate for nine years with processing of the Mineral Reserve over 10 years. Exploration to identify other deposits in the area is ongoing.
Sustainable development	Environmental Impact Study submitted to Chilean authorities in 2018. Approval process expected to take approximately 18 – 24 months.

Brief history of Salares Norte

Gold Fields discovered the Salares Norte deposit in 2011 through a systematic greenfields exploration programme. This programme focused on the northern end of the Maricunga metallogenic belt beyond the extent of the known Miocene precious metal deposits. Gold Fields selected the district based on a combination of conceptual models and metallogenic criteria. The identification of favourable spectral targets, surface geochemical anomalies, and geophysics followed by RC and diamond drilling all contributed to the discovery. Gold Fields continued drilling the deposit and in 2013 published a maiden Mineral Resource for the Brecha Principal deposit. Gold Fields published updated Mineral Resources in 2015, 2016, and 2017 based on additional infill and exploration drilling. The most recent Resource model was completed in May 2018 and is used for the current Mineral Resource declaration. A DFS was completed in December 2018 and supports declaration of the maiden Mineral Reserve.

Key developments and material issues

- An interim scoping study was completed in 2014, which showed positive results. The scoping study was updated in 2015 after additional drilling, metallurgical testing and cost analysis
- The environmental impact statement that was approved in January 2014 was amended in 2016 to permit continued exploration drilling
- A positive PFS was completed for the Brecha Principal deposit in March 2017. Following additional drilling in 2017 and Q1 2018 mainly at Agua Amarga, Salares Norte reflects a significant improvement in Resource model resolution and confidence with 97% of the Resource now in the Indicated category for gold metal
- Improved confidence in the estimate has been achieved through Agua Amarga infill drilling and grade control-spaced test drilling at Agua Amarga and Brecha Principal to test local geology and grade domains defining higher grade zones
- An interim FS for Brecha Principal and Agua Amarga was completed in Q1 2018 and a DFS was completed in Q4 2018
- A comprehensive sampling and assay QA/QC protocol is in place for Salares Norte using leading industry practice in data acquisition, reputable certified laboratories, and analytical controls. In addition, the project database, geological models, resource models and the LoM plan have been successfully audited by external consultants and the Mineral Resource and Mineral Reserve confirmed as SAMREC-compliant
- See permitting section below for chinchilla relocation programme
- Limited amounts of mercury are a product of the metallurgical process and will be managed within the regulatory framework administered in country, however, further more rigorous solutions for product retirement are being assessed by Gold Fields
- The water balance model indicates very minor fluctuations to the Salares Norte water table over the life of the project, with negligible anticipated impact to flora and fauna, which will be closely monitored

Highlights of the definitive FS

The DFS has been completed with engineering and design input from several consulting groups in Chile, including Fluor (processing and infrastructure), NCL (mining), and SRK (geotechnical, waste, and TSFs). The DFS included further optimisation which reduced the pre-strip requirements and also reduced the peak mining rate.

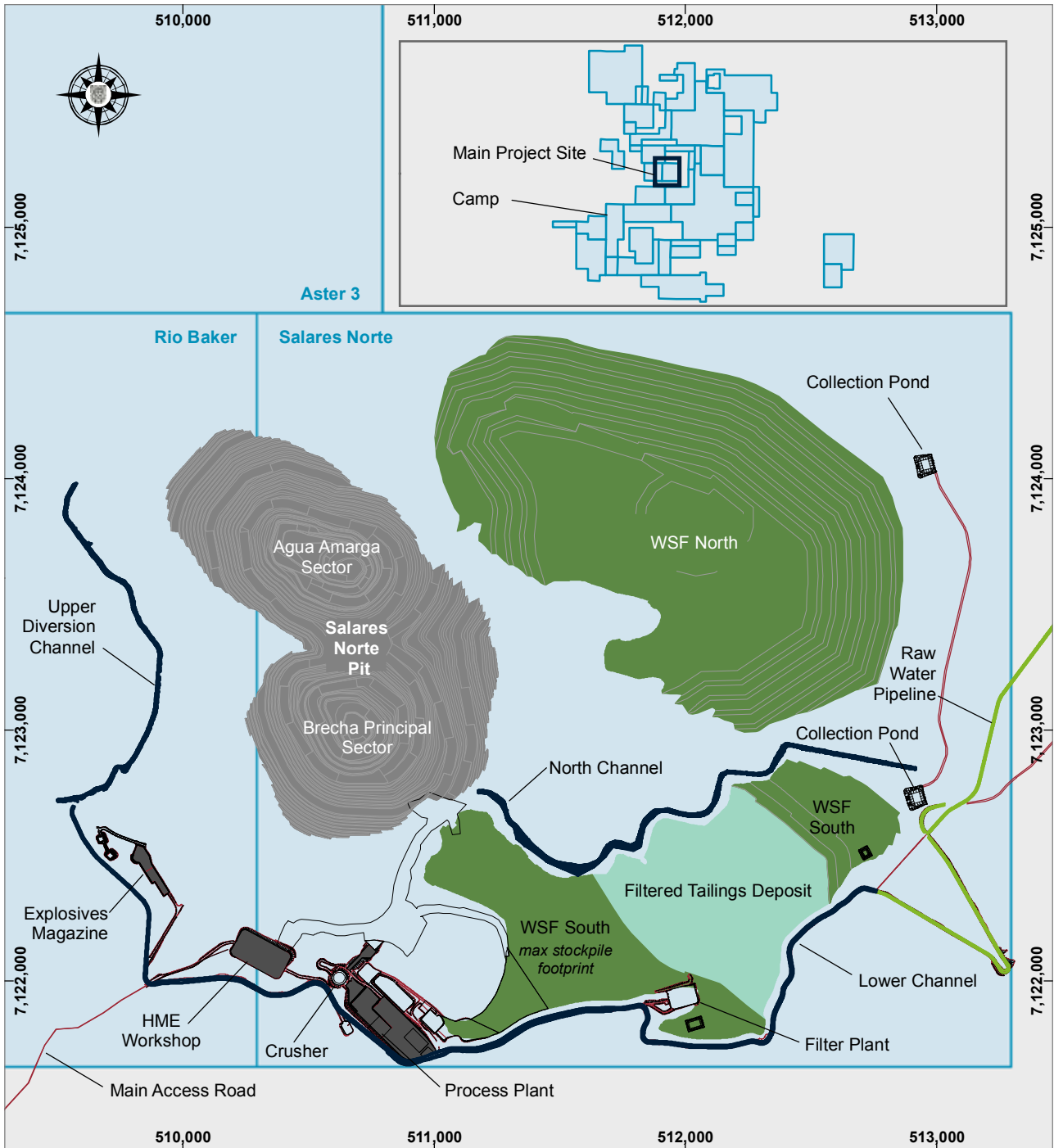
Design concept

Following a two-year period of construction and pre-stripping, open pit mining will commence at Brecha Principal followed by the Agua Amarga deposit. Waste will be stored in two WSFs. Ore will be processed at a rate of 2Mtpa. The process flowsheet includes single stage crushing, SAG and ball milling, leaching in agitated tanks, and hybrid metal extraction employing both Merrill-Crowe and CIP. Tailings from the CIP will be subjected to cyanide detoxification prior to filtration. The filter cake will be trucked to the dry stack tailings facility. Power supply will be from on-site diesel power generators while water will be sourced from groundwater wells located approximately 12km from the plant area. The following project layout is shown for reference:

Americas region continued

Salares Norte project – 100% attributable to Gold Fields continued

PROJECT SITE INFRASTRUCTURE LAYOUT

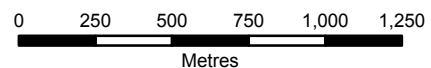


Reference

- | | | | |
|------------------------|--|------------------------------|--|
| Building | | Filtered Tailings Deposit | |
| Road | | Waste Storage Facility (WSF) | |
| Concession(s) Boundary | | Open Pit | |
| | | Proposed Infrastructure | |
| | | Pipeline | |
| | | Channels | |

Gold Fields Limited Salares Norte Project

PLAN SHOWING PLANNED INFRASTRUCTURE AS AT DECEMBER 2018



Co-ordinate System: WGS 1984 UTM Zone 19S
Projection: Transverse Mercator

The key physical results from the DFS and LoM plan for the potential new mine are summarised below:

Item	Unit	DFS value
Indicated resource	%	97
Waste mined ¹	Mt	310 ¹
Pre-strip	Mt	50.5
Ore mined	Mt	21.1
Plant throughput	Mtpa	2.0
Strip Ratio LoM ¹	W:O	14.7 ¹
Au grade	g/t	5.13
Ag grade	g/t	57.93
Au recovery	%	92.7
Ag recovery	%	67.5
LoM	years	10

■ Gold Price: US\$1200/oz, Silver price: US\$17.50/oz

■ Capex presented in Q4 2018 real terms

¹ Pre-strip included in waste mined and LoM strip ratio

Permitting and development schedule

The EIA was officially accepted by the Chilean Environmental Evaluation Service or the “Servicio de Evaluación Ambiental” (SEA) in July 2018. The only significant impact identified as part of the EIA relates to the alteration and loss of habitat of the chinchilla, a critically endangered species in the area. A relocation and protection programme has been developed to compensate for this alteration and loss in habitat. The proposed relocation area is approximately 4km from the Salares Norte property. The SEA issued consolidated questions to the EIA submission in October 2018 and MGFSN is in the process of preparing a response planned to be submitted prior to Q2 2019.

The EIA is on the critical path of the project and the current project schedule considers an 18 to 24-month approval time frame. The EIA approval is therefore expected mid-2020, allowing for potential first gold production by Q1 2023. The project has secured the necessary permits to complete the study phase of the project. The approved environmental impact statement covers all necessary environmental disturbance and impacts until the formal EIA is approved.

The key project development milestones for the potential new mine are shown below:

Milestone	Date
Detailed engineering for plant and Infrastructure commenced	01 Apr 2018
DFS – Salares Norte	31 Dec 2018
DFS – peer review	Q1 2019
Detailed engineering substantially completed (>55%)	2020
EIA approval	2020
Mobilisation for mine pioneering and construction	Q3 2020
First Au production	Q1 2023

District exploration

In 2018, the district exploration programme focused on Aster 3 and Aster 2, as well as the Helada-Mayweather prospects, with the strategic intent of defining additional mineable resources to bolster the overall LoM plan and increase flexibility and further optionality for the project. In 2019, the district exploration campaign will continue drilling the most promising surrounding targets, initially at Horizonte, Aster 2 and Helada-Mayweather. These targets have been prioritised as a result of an integration of the recent district airborne magnetics survey, district geological mapping, geochemistry and a Worldview three spectral alteration study.

Americas region continued

Salares Norte Project – 100% attributable to GFI continued

Mining

Mine planning is based on open pit mining to exploit the Brecha Principal and Agua Amarga deposits.

Production is based on a constant plant throughout rate of 2Mtpa and peak total material movement of 44Mtpa. During the LoM, 331Mt will be mined, consisting of 21.1Mt of ore to the plant and 310Mt of waste, resulting in a strip ratio of 14.7:1. Pioneering, pre-stripping, and mine operational activities are to be performed by a specialised mining contractor. Blasting operations will be performed by a contractor.

To improve the project economics, the mine plan is based on an accelerated mining strategy, thus all ore must be stockpiled and re-handled to feed the crusher. This strategy will provide flexibility to manage gold and silver grades for improved gold recoveries, especially during the first years of operations. With this strategy, the mine and plant are decoupled, so the mine life is nine years (two for pre-stripping plus seven for operations) and the DFS plant operating life is 11.5 years plus two years for construction.

Mining methods

The mining contractor will use open pit mining methods and medium-sized diesel equipment. Mining will be done on 15m benches with waste mined in a single pass and ore benches split into three 5m flitches. Haul roads have a maximum gradient of 10%. Powder factors for blasting vary according to the rock hardness, and powder factors range from 91g to 149g of explosives per tonne of rock.

Initially, waste will be hauled to the south WSF to build the pad for the plant and TSF. Once the pad is

completed waste will be hauled to the north WSF. All ore will be hauled to either the RoM pad or one of the grade-bin stockpiles, from which it will be re-handled to the crusher. The mining contractor will be responsible for hauling the tailings from the plant to the TSF.

Mine planning and scheduling

The Salares Norte LoM plan is based on detailed and well-informed geological and Resource block models. The LoM plan is established from detailed short- and long-term mine design and production schedules based on reliable production rates and well-defined modifying factors. These are supported by benchmarking against mining performance data from a number of other operations representative of the altitude and operational conditions anticipated at Salares Norte. Planning utilises specialised mine planning software and a LoM Resource estimation model known as the localised uniform conditioning model, which uses specialised geostatistical software.

Innovation and technology

Salares Norte has recently begun trials on the TerraCore hyperspectral imaging system used to map mineral chemistry and alteration styles/intensity in core in great detail. This type of information will enhance the quality of existing geological models and has the potential to improve understanding of gold and silver mineralisation and processing characteristics.

Renewable energy opportunities, with emphasis on solar generated power, are also being assessed for potential incorporation into the energy management plan.

Mineral Resources and Mineral Reserves

All relevant geological and evaluation models have been updated for the DFS and reflect the latest available data sets as at December 2018.

The Mineral Resources are reported at an average NSR cut-off of US\$43.00/t processed. Mineral Reserves are reported at an average NSR cut-off of US\$43.16/t. Actual NSR cut-offs for Resources and Reserves are variable because the process recoveries and cost are dependent on the head grade. Resources are constrained within an optimised pit shell and Reserves are based on the DFS designed ultimate pit and production schedule. Both are based on the relevant realistic economic parameters and modifiers.

Mineral Resources

The Mineral Resource estimates are classified as Indicated and Inferred as described in the SAMREC Code. Mineral Resource categories are assigned with consideration given to geological complexity, grade variance and sensitivity and drill hole spacing, and are reported as in situ within a pit shell. The geological model is based on lithology, mineralisation, alteration, and structure using information from exploratory and infill drill holes.

MINERAL RESOURCE CLASSIFICATION

Gold	Tonnes (kt)			Grade (g/t)			Au (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Classification									
Open Pit									
Measured									
Indicated	23,700	20,955	12,100	4.99	5.18	5.05	3,800	3,491	1,963
Inferred	1,860	2,343	13,526	1.84	2.28	4.22	110	172	1,831
Total open pit	25,560	23,298	25,626	4.76	4.89	4.61	3,910	3,663	3,794

Silver	Tonnes (kt)			Grade (g/t)			Ag (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Classification									
Open pit									
Measured									
Indicated	23,700	20,955	12,100	56.31	72.10	69.60	42,910	48,573	27,075
Inferred	1,860	2,343	13,526	12.62	11.75	38.37	754	885	16,686
Total open pit	25,560	23,298	25,626	53.13	66.03	53.11	43,664	49,458	43,761

Deposit	Classification	Tonnes (kt)	Au (g/t)	Ag (g/t)	Au (koz)	Ag (koz)
Brecha Principal	Indicated	15,883	5.27	68.64	2,690	35,051
	Inferred	1,081	1.86	17.01	65	591
	Sub-total	16,964	5.05	65.35	2,755	35,642
Agua Amarga	Indicated	7,831	4.43	31.23	1,114	7,864
	Inferred	761	1.80	6.39	44	156
	Sub-total	8,592	4.19	29.03	1,158	8,020
Total		25,560	4.76	53.13	3,910	43,664

- Mineral Resources are reported according to the SAMREC Code
- Confidence classification assumes annual production-scale and open pit mining
- These Mineral Resources are classified as Indicated and Inferred. The Competent Person has reasonable confidence in the Resources, but future drilling may materially change the Resource evaluation
- Commodity prices used for reporting Resources are US\$1,400/oz gold and US\$20.00/oz silver
- Mineral Resources are constrained within a Whittle optimised pit shell, which considered mining, processing and administrative costs, process recovery and sustaining capital
- Mineral Resources are reported in situ for material within a pit shell having positive value after process recovery and costs for processing, refining, royalties, and administrative costs have been applied. A variable cut-off is applied since the process recoveries and cost are dependent on head grade. This resulted in an average revenue cut-off grade of US\$43/t processed based on 1% royalty; average process recoveries of 92.4% for gold and 67.2% for silver; refining costs of US\$2.78/oz for gold and US\$1.21/oz for silver; average ore and tailings handling cost of US\$5.10/t-processed; average processing cost of US\$28.61/t processed; sustaining capital costs of US\$1.60/t processed; administrative costs of US\$19.5M per year; and average mining costs of US\$2.94/t mined
- Mineral Resources are reported without mining dilution and loss. Mining dilution and loss were accounted for in pit shell generation
- Mineral Resources are reported inclusive of Mineral Reserves
- Figures are rounded to reflect confidence. Some figures may not sum or average exactly due to rounding. The Competent Person deems these small discrepancies to be immaterial

Americas region continuedSalares Norte Project – 100% attributable to GFI continued**Modifying factors**

- The Measured and Indicated Mineral Resources are inclusive of Mineral Reserves
- Mineral Resources and Mineral Reserves are quoted as at December 2018

- Mineral Reserves are stated in terms of RoM grades and tonnages as delivered to the metallurgical processing facility and are therefore fully diluted
- This Mineral Reserve statement includes only Indicated Mineral Resources, modified to produce

Probable Mineral Reserves and contained within the LoM plan

- Mineral Resources and Mineral Reserves undergo internal audits during the year and any issues identified are rectified at the earliest opportunity – usually during the current reporting cycle

	Units	December		
		2018	2017	2016
Mineral Resource parameters				
Mineral Resource Au price	US\$/oz	1,400	1,400	1,400
Mineral Resource Ag price	US\$/oz	20.0	20.0	20.0
NSR ¹ for mill feed	US\$/t	43.00		
Mineral Reserve parameters				
Mineral Reserve Au price	US\$/oz	1,200		
Mineral Reserve Ag price	US\$/oz	17.5		
NSR for mill feed	US\$/t	43.16		
Strip ratio (waste:ore)	ratio	14.70		
Dilution open pit	%	3.12		
MCF	%	100		
Mining recovery factor (open pit)	%	100		
Plant recovery factor (Au)	%	92.7		
Plant recovery factor (Ag)	%	67.5		
Processing capacity	Mtpa	2.0		

¹ NSR is defined as the return from sales of concentrates, expressed in US\$/t, i.e., $NSR = (Au\ price - Au\ selling\ cost) \times Au\ grade \times Au\ recovery + (Ag\ price - Ag\ selling\ cost) \times Ag\ grade \times Ag\ recovery$. A variable NSR is applied to the LoM plan to optimise the NPV and FCF

Mineral Reserves

The Mineral Reserve estimate for Salares Norte is based on a suitably detailed and engineered FS and subsequent LoM plan. All design and scheduling work is undertaken to an appropriate level of detail by experienced engineers using

specialised mine planning software. The planning process incorporates relevant modifying factors and realistic production and processing rates supported by an NSR cut-off and other techno-economic investigations, including pit staging, geotechnical domain modelling and

hydrogeological studies. Appropriate LoM sustaining capital is incorporated in the cash-flow model to underpin the Mineral Reserve. Low-grade stockpile material that is value accretive is scheduled for treatment at the end of the LoM.

MINERAL RESERVE CLASSIFICATION

Gold	Tonnes (kt)			Grade (g/t)			Au (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Classification									
Open pit									
Proved									
Probable	21,079			5.13			3,476		
Total open pit	21,079			5.13			3,476		

Silver	Tonnes (kt)			Grade (g/t)			Ag (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Classification									
Open pit									
Proved									
Probable	21,079			57.94			39,263		
Total open pit	21,079			57.94			39,263		

MINERAL RESERVE BY DEPOSIT

Deposit	Class	Tonnes (kt)	Au (g/t)	Ag (g/t)	Au (koz)	Ag (koz)
Brecha Principal	Probable	15,373	5.23	69.20	2,587	34,205
Agua Amarga	Probable	5,706	4.84	27.57	889	5,058
Total	Probable	21,079	5.13	57.94	3,476	39,263

- Mineral Reserves are reported according to the SAMREC Code
- Confidence classification assumes annual production-scale and open pit mining
- Mineral Reserves are classified as Probable and are based on Indicated Mineral Resources. The Competent Person has reasonable confidence in the Reserves, but future drilling may materially change the Reserve evaluation
- Commodity prices used for reporting Reserves are US\$1,200/oz gold and US\$17.50/oz silver
- Mineral Reserves are based on the 2018 DFS production schedule which was constrained by a designed open pit. Modifying factors including mining, processing, and administrative costs, process recovery and sustaining capital cost are at an FS level
- Mineral Reserves are reported using RoM tonnes and grades as delivered to the mill and are therefore fully diluted
- A variable revenue cut-off was applied in the estimation of Mineral Reserves because the process recoveries and cost are dependent on the head grade. This resulted in an average revenue cut-off grade of US\$43.16/t processed based on 1% royalty, average process recoveries of 92.7% for gold and 67.5% for silver, refining costs of US\$2.53/oz for gold and US\$1.21/oz for silver, average process costs of US\$35.47/t processed, and administrative costs of US\$19.5M per year. Average mining costs were US\$2.39/t mined
- Mineral Reserves include marginal ore valuated at an average revenue cut-off of US\$34.16/t processed, considering a reduction on costs during the re-handling period at the end of life of the processing facility
- Mineral Reserves are included in the Mineral Resource estimate
- Figures are rounded to reflect confidence. Some figures may not sum or average exactly due to rounding. The CP deems these small discrepancies to be immaterial

Americas region continued

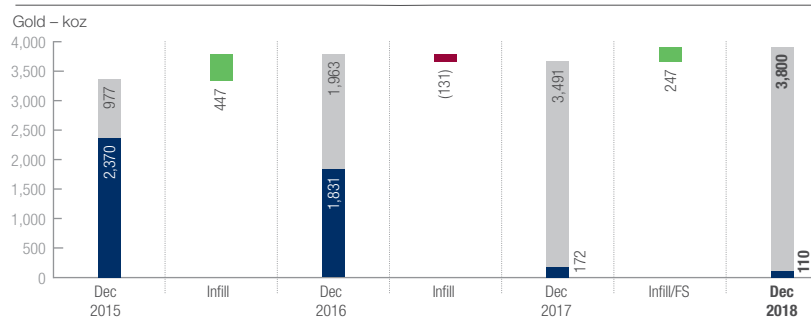
Salares Norte Project – 100% attributable to GFI continued

MINERAL RESOURCE AND MINERAL RESERVE RECONCILIATION YEAR ON YEAR

Factors that affected Mineral Resource reconciliation	Factors that affected Mineral Reserve reconciliation
Decrease in estimated processing costs based on new analysis with nominal impact on the NSR cut-off value	No reconciliation due to maiden Mineral Reserve declaration as at December 2018
Discovery of additional high-grade gold mineralisation at Agua Amarga from circa 14km of definition drilling	
Improved confidence in the estimate through Agua Amarga infill drilling and grade control-spaced test drilling at Agua Amarga and Brecha Principal	

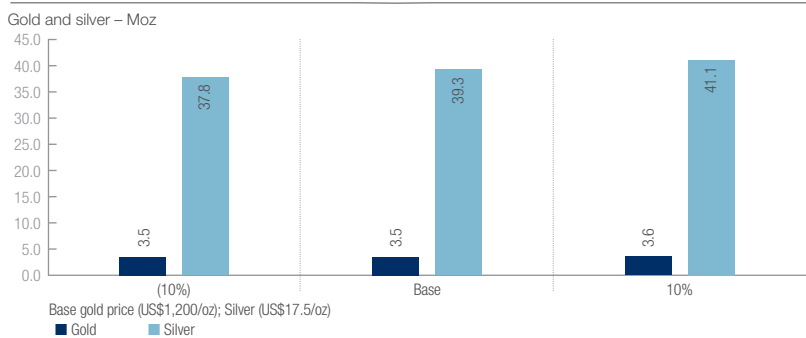
Change in gold Mineral Resources

Mineral Resource reconciliation

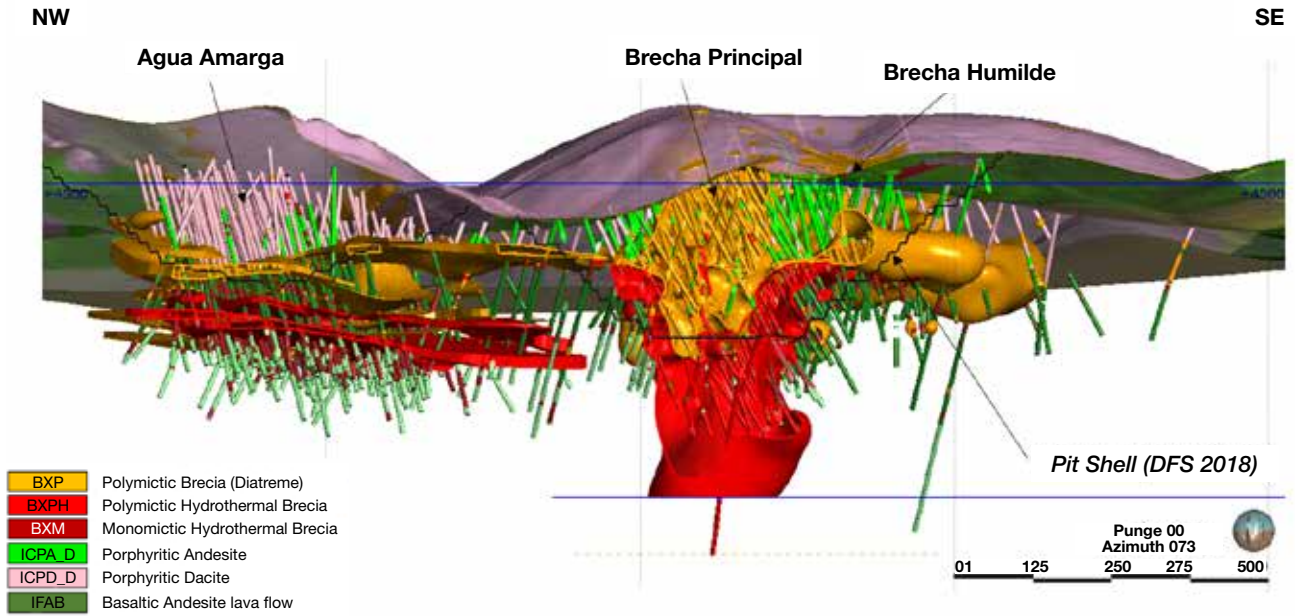


Mineral Reserve sensitivity (gold – Moz; silver – Moz)

Mineral Reserve sensitivity



**LONGITUDINAL SECTION LOOKING NE
(SHOWING BOREHOLES AND MAIN ORE ZONES)**





Australia region

The Australian mines continue to benefit from sizeable annual investments in extensional and brownfield exploration (US\$63.3M in 2018) with Agnew, Granny Smith and St Ives all increasing Resources and Reserves, net of depletion.

The Gruyere joint venture (JV) mine is in final construction with first gold targeted by mid-year and production and plant ramp-up continuing in H2 2019.



AUSTRALIA REGION SALIENT POINTS

Mineral Resources

17.1Moz*

>> The Mineral Resources for the region grew by 7% net of depletion

* 100% attributable to Gold Fields

PROJECTS

FSE project – 40% Attributable to GFI

Gold and copper deposit in the Philippines

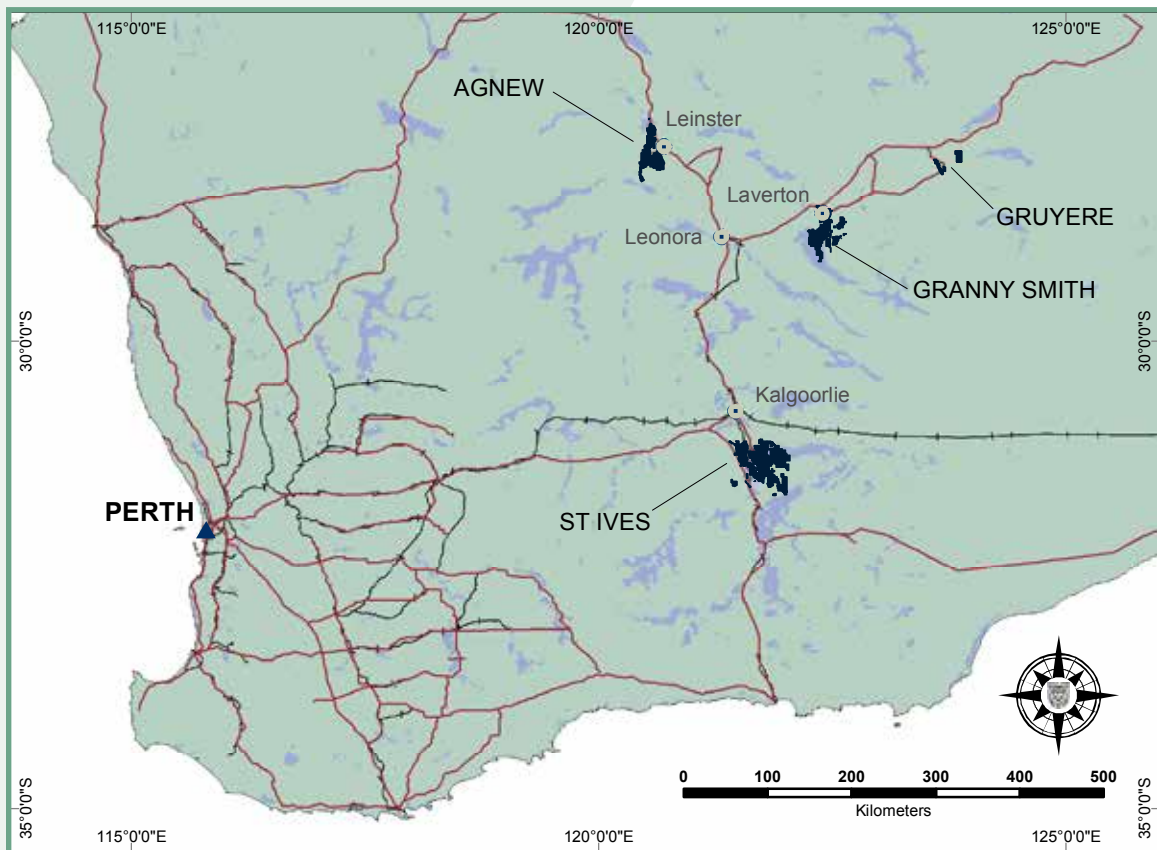
Mineral Reserves

6.4Moz*

>> The Mineral Reserves for the region post depletion grew by 4%

Mineral Resources

19.8Moz gold and 9,921Mlb copper



Australia region continued

OPERATIONAL PROFILES	St Ives	Agnew	Granny Smith	Gruyere JV
Mining method	Open pit and underground	Underground	Underground	Open pit
Infrastructure and mineral processing	Two main open pits, three underground mines with a new major UG expansion planned in 2020. One gold processing plant with a throughput capacity of 4.7Mtpa consisting of a primary gyratory crusher, a single-stage Semi Autogenous Grind (SAG) mill with a gravity circuit and five-stage Carbon in Pulp (CIP) circuit. Gold is recovered by electro winning.	Two underground complexes and one processing plant, with a capacity of 1.3Mtpa consisting of a three-stage crushing circuit, two-stage milling circuit, gravity circuit and CIP circuit.	One active underground mine. A processing plant with a capacity of 3.5Mtpa consisting of two crushing circuits, SAG and ball mills, leach and CIP circuits and a tailings retreatment circuit. However, it is mine constrained and currently operates at 1.5Mtpa on a campaign milling basis.	The main Gruyere open pit commenced mining in Q4 2018. Construction of all mine infrastructure is on schedule to support operational activities in 2019. The processing plant, with a capacity of 8.2Mtpa, consisting of single stage crush and SABC ¹ circuit with pebble crushing is due for commissioning in H1 2019.
Tailings storage facility (TSF)	Tailings stored in two paddock-type facilities and a new in-pit TSF at Leviathan, which will meet current life-of-mine (LoM) requirements.	TSF 4 established and commissioned in 2017, projected to receive tails, including stage 4 approvals, until 2025. Songvang in-pit tailings commenced in 2018 with total capacity sufficient for LoM needs.	The TSF capacity is projected to last until 2021. TSF 3 had approval to complete a further lift during 2018 providing 4Mt capacity. Evaluation of further TSF options for an extended LoM are in progress.	Construction of main TSF facility was completed in 2018 in preparation for processing commencement in 2019. The TSF capacity is projected to last until 2030 for all planned mining.
Mineralisation style	Orogenic greenstone hosted (hydrothermal-style). Mineralisation typically structurally controlled and hosted by shear and fault zones and confined to well-defined prospective structural belts.			
Mineralisation characteristics	Mineralisation zones discontinuous with short-range predictability.		Mineralisation zones with moderate to long-range geological continuity and short-range grade continuity.	
Exploration	Ongoing exploration programmes required to drive discovery, define the mineralisation controls, establish continuity and convert Mineral Resources to Mineral Reserves.			

¹ Semi-autogenous ball mill crusher

Regional overview

Gold Fields' mining assets in the Australia region (GFA) include a 100% interest in the St Ives, Agnew and Granny Smith mines and a 50:50 interest in the Gruyere JV project with Gold Road Resources located in the Yilgarn area of Western Australia.

In line with the orogenic style of mineralisation in the Yilgarn district, maintaining momentum on multi-year brownfield exploration is essential to build a pipeline of high quality targets capable of replacing depletion and growing the life of the operations (2018: A\$84.76M; US\$63.3M). Orogenic ore bodies, by their nature, generally support operations with relatively short LoM profiles at any point in time – three to five years of Proved and Probable Mineral Reserves is not unusual. Importantly, orogenic-based mines tend to replenish and increase Reserves through cyclical near-mine exploration, camp discovery growth and continued Resource to Reserve conversion. The exploration strategy is aimed at converting each mine's geological endowment potential by locating and defining economic ore bodies that will support the next generation of mines. The GFA exploration strategy is supported by a dedicated team of geology specialists with broad expertise who support the site teams to ensure an integrated approach to target generation, prospectivity mapping and optimising in-ground expenditure. Non-geological criteria such as 'lead time to mining' are also considered in budget allocation and prioritisation of projects.

Significant brownfield projects include establishment of the Waroonga North

mining front at Agnew, development of the Zone 110/120 ore body at Granny Smith, advancement of the Invincible South underground mine and definition of the Hamlet North extension at St Ives.

Regional geology

The Norseman-Wiluna Archaean Greenstone Belt hosts three of the operations and is part of the Yilgarn Craton, a 2.6 Giga annum (Ga) granite-greenstone terrain, which is well endowed with gold and nickel mineralisation.

Deposits are hosted within a diverse range of rocks, including basalts and dolerites, fine to coarse-grained sedimentary rocks, and felsic to intermediate intrusions. Host rocks are commonly metamorphosed to greenschist or lower amphibolite facies. Gold mineralisation is typically structurally controlled, occurring within a network of shear zones proximal to major regional faults. The most important gold mineralisation styles are shear hosted quartz-carbonate bearing breccia lodes and associated quartz vein arrays, together with finely disseminated gold associated with zones of strong hydrothermal alteration. Alteration comprises silica or albite-rich zones, associated with ankerite, sericite, biotite or amphibole, together with pyrite, pyrrhotite or arsenopyrite as sulphide-bearing phases.

Gold Fields holds a 50% interest in the Gruyere project and its associated exploration tenements lie within the Yamarna and Dorothy Hills Greenstone Belts, the eastern most known greenstone belts of the Archaean Yilgarn Craton. The greenstone belts

of the Yilgarn Craton are the dominant host for gold mineralisation and mined production in Australia.

The Gruyere deposit is an Archaean orogenic gold deposit and is located on a flexure point of the regional-scale Dorothy Hills Shear Zone within the Dorothy Hills Greenstone Belt, where the shear zone changes from a northerly direction to a NNW direction. Gold mineralisation is hosted within the steep easterly dipping Gruyere Porphyry, a medium-grained quartz monzonite porphyry that has intruded the country rocks, elongated in the direction of the shear zone.

Exploration drilling and expenditure

On-lease exploration metres drilled and expenditure for the year ended 31 December 2018 are summarised below (exclusive of grade control drilling). The higher overall cost per metre drilled year on year is primarily due to the increased ratio of diamond drilling in support of the key underground projects at Agnew, St Ives and Granny Smith being advanced to provide the next generation of mining fronts.

The region maintains rigorous quality assurance and quality control (QA/QC) protocols on all its exploration programmes. It draws on industry-leading practice for data acquisition and utilises accredited laboratories, which are regularly reviewed both internally and externally. Analytical QA/QC is maintained and monitored through the submission of blanks, certified reference material and duplicates, plus umpire laboratory checks.

	December 2018			December 2017		
	Metres drilled	A\$M	US\$M	Metres drilled	A\$M	US\$M
Exploration drilling Operations						
Agnew	122,082	23.09	17.25	194,910	28.27	21.64
Darlot				201	2.03	1.55
Granny Smith	165,456	23.49	17.55	227,357	25.28	19.35
St Ives	124,355	36.36	27.16	225,665	38.53	29.49
Gruyere (100% of metres & 50% of costs)	6,901	1.82	1.36	32,699	4.45	3.41
Total¹	418,794	84.76	63.32	680,832	98.56	75.44

Average 2018 exchange rate: 1A\$=0.75US\$

Drilling unit costs are affected by the length, type (diamond drill (DD), reverse circulation (RC), aircore or sonic), ground conditions, rig and site availability, as well as whether drilling is from surface or underground

¹ The year-on-year reduction in total metres drilled is due to the increased ratio of diamond drilling, which is slower and higher cost, in support of the key underground projects at Agnew, St Ives and Granny Smith versus a lower ratio on aircore and RC drilling activity on brownfield exploration

Australia region continued

Mineral Resources and Mineral Reserves

Mineral Resources

The Mineral Resources declared are classified as Measured, Indicated or Inferred, as described in the SAMREC Code. Mineral Resource categories are assigned with consideration given to geological complexity, grade variance, drill hole intersection spacing and proximity of mining development. The following factors apply to the Mineral Resources reported:

- All Mineral Resources are declared using a cut-off grade calculated for the individual deposit
- Mineral Resources are further tested through the application of realistic modifying factors to ensure that there is a reasonable prospect of eventual economic extraction

- Mineral Resources are quoted at an appropriate in situ economic cut-off grade with tonnages and grades based on the relevant resource block models. They also include estimates of any material below the cut-off grade required to be mined to extract the complete pay portion of the Mineral Resource
- Open pit Mineral Resources comprise the material above the nominated cut-off grade within a diluted optimised pit shell and are constrained to an optimised minimum mining width shape
- Underground Mineral Resources comprise the material above the nominated cut-off grade and are constrained to a practical mining shape and a minimum mining width

Mineral Reserves

The Mineral Reserve estimates are based on appropriately detailed and engineered LoM plans and supported by relevant studies completed to a minimum pre-feasibility study (PFS) level. All design and scheduling work is undertaken to a suitable level of detail by experienced engineers using appropriate mine planning software. The planning process incorporates relevant modifying factors, the use of cut-off grades and results from other techno-economic investigations. All prevailing geotechnical protocols and constraints are taken account of in the mine design and scheduling, including the provision of sufficient WSFs and TSFs facilities and processing plant capacities to meet LoM requirements.

AUSTRALIA REGION: SUMMARY MINERAL RESOURCE AND MINERAL RESERVE ESTIMATE FOR OPERATIONAL MINES¹

	Mineral Resources				Proved and Probable	Mineral Reserves			
	December 2018			Dec 2017		December 2018			Dec 2017
	Tonnes (Mt)	Grade (g/t)	Gold (Moz)	Gold (Moz)		Tonnes (Mt)	Grade (g/t)	Gold (Moz)	Gold (Moz)
Measured, Indicated and Inferred									
Agnew	12.3	5.16	2.05	1.95	Agnew	3.7	4.72	0.56	0.54
Granny Smith	46.2	5.27	7.84	7.08	Granny Smith	12.6	5.54	2.25	2.20
St Ives	33.2	3.68	3.93	3.85	St Ives	19.1	2.84	1.74	1.57
Gruyere	77.7	1.32	3.31	3.13	Gruyere	47.1	1.25	1.89	1.87
Total	169.5	3.14	17.12	16.00	Total	82.5	2.43	6.44	6.18

¹ Managed, unless otherwise stated (Gruyere: only the Gold Fields attributable figures are reported)

– Mineral Resources are inclusive of Mineral Reserves

– All tonnes (t) relate to metric units and rounding off of figures may result in minor computational discrepancies. Where this happens, it is not deemed significant

Agnew gold mine



During 2018, Agnew continued its focus on defining and extending known ore sources at both the Waroonga mine and at New Holland. The Waroonga complex continues to offer multiple growth opportunities. At New Holland, emphasis is on exploring the Sheba South, Cinderella and Himitsu areas and assessing bulk stoping opportunities. Development of the Waroonga North project has continued in conjunction with extensions to FBH aimed at profiling the full ore body potential. Drilling results from Redeemer Zone 2 are encouraging and the project will be advanced in 2019 with a study to establish economic viability.

ASSET FUNDAMENTALS

General location	Agnew is situated at latitude 27° 55' S and longitude 120° 42' E in the Norseman-Wiluna Greenstone Belt. It is located 23km west of the town of Leinster in Western Australia, which is 375km north of Kalgoorlie and approximately 870km NE of Perth. Well-established power, access roads and supporting infrastructure are in place.
Licence status and holdings	The Agnew Gold Mining Company Proprietary Limited (AGMC), ACN 098-385-883, was incorporated in Australia in 2001 as the legal entity holding and conducting mining activity on the Agnew mineral leases. The Gold Fields Limited Group holds 100% of the issued shares of AGMC through its 100% holding in the issued shares of Orogen Holding (BVI) Limited. Agnew holds tenements covering an area of approximately 82,932ha, inclusive of four non-managed tenements (7,0801ha). The combined Agnew has a 100% holding in 120 granted leases covering 74,916ha for mining, exploration and prospecting, and 935ha of miscellaneous (17) licences. Agnew has security of tenure for all current exploration and mining leases that contribute to future Mineral Reserves.
Operational infrastructure and mineral processing	Agnew currently operates two underground mines, Waroonga and New Holland. At Waroonga, ore is sourced from the Kim South, FBH and Main North lodes that are accessed via declines. New Holland mining occurs in four primary areas: Genesis, New Holland, Cinderella and Sheba. These are accessed via declines. There are also centralised administrative offices, as well as engineering workshops at both Waroonga and New Holland and one active CIP processing plant with 1.3Mtpa capacity.
Climate	No extreme climate conditions are experienced that may affect mining operations.
Local geology and deposit type	<p>Agnew gold mine is situated in the northern portion of the Norseman-Wiluna Greenstone Belt of the Yilgarn Craton, Western Australia. Locally, the Belt comprises a sequence of mafic to ultramafic volcanics and associated interflow sediments, which have been folded to form the Lawlers Anticline.</p> <p>The mafic and ultramafic volcanics of the Lawlers Anticline are unconformably overlain by a sequence of clastic sediments comprising the Scotty Creek Formation. The sedimentary rocks have been metamorphosed to lower greenschist facies and comprise conglomerates and very fine to very coarse-grained pebbly sandstones and siltstones.</p> <p>The Agnew deposits are broadly hosted by the intersections between various structures and the relative stratigraphy. Gold mineralisation largely occurs in quartz veins within the sedimentary units of the Scotty Creek Formation.</p> <p>Orogenic greenstone gold deposits are hosted in a number of different styles of lodes. Although all of the Agnew deposits broadly occur at the intersections between structures and stratigraphy, there are subtle differences in alteration and mineralisation, which are controlled in part by the local host rock chemistry.</p>
LoM	Extensional and brownfield exploration continues, which could extend the LoM given the modelled endowment potential and under-explored sections of the tenements. It is estimated that the current Mineral Reserves will be depleted in 2022 (four years).
Sustainable development	<p>Agnew continues to be certified to OHSAS18001 and ISO14001. During 2014, the New Holland operations were amalgamated under these certifications.</p> <p>The mine was recertified compliant with the International Cyanide Management Code (ICMC) in September 2016.</p>

Australia region continued

Agnew gold mine continued

Brief history of Agnew

Paddy Lawlers' prospecting party was responsible for the discovery of gold at Lamehorse Soak in 1894, approximately 10km south of Agnew. The Great Eastern and Donegal leases were pegged in the same year and mining commenced. The discovery and subsequent mining of the Waroonga, Glasgow Lass, New Holland and Cinderella areas all commenced before 1899. East Murchison United commenced the mining of nine underground levels at Main Lode in 1935 and the mine was operational until 1948.

In 1976, Western Mining Corporation (WMC) purchased the Waroonga leases and in 1984 Forsayth NL purchased the Great Eastern leases and modern open pit mining commenced at both Waroonga (450 South) and Lawlers in the mid-1980s. Additional discoveries at Redeemer (1985), Cox-Crusader (1987) and Genesis (1990) ensured that both the Emu and Lawlers mills operated at capacity while additional open pit

discoveries at New Holland (1991) and Fairyland (1997) were made before underground mining commenced at New Holland in 1998.

The Lawlers operation was purchased by Plutonic Resources from Forsayth in 1992 and was subsequently acquired by Homestake in 1998. During 2001, Barrick merged with Homestake and Gold Fields acquired Agnew from WMC. The Kim South lode at Waroonga was discovered in 2002, as was Songvang OP, with production commencing in 2002 and 2004 respectively. Gold Fields concluded the acquisition of the neighbouring Lawlers mine from Barrick in October 2013.

Key developments and material issues

The imperative at Agnew is to define additional quality Reserves that can enhance and grow the current LoM to sustain the operation beyond 2022. LoM extension is a critical focus area for Agnew in 2019 based on the following activities:

- Extensional and resource definition drilling at Waroonga North, FBH and Sheba leveraging the short- to medium-term growth opportunities
- Continuation of positive exploration at Redeemer Zone 2 North and Barren Lands
- Monitoring impact on production of unplanned rehabilitation and poor ground conditions in deeper sections of the mine
- Further progression and optimisation of site's open pit potential building on the PFS completed in 2018. Surface mining Reserves include 450 South, Leviathan North, Claudius and Maria
- Focus is on defining the next cohesive ore body at New Holland (post the Genesis 500 zone), with emphasis on the Sheba sections and until this is achieved production volatility will continue from this area
- Implementation of an independent mine camp and power plant has assisted in controlling operating costs



Operating statistics

		Historic performance		
		Dec 2018	Dec 2017	Dec 2016
Units				
Underground mining				
Total mined	kt	1,955	1,905	1,983
– Waste mined (opex)	kt	230	223	216
– Waste mined (capex)	kt	509	508	558
– Ore mined	kt	1,216	1,174	1,208
Mined grade	g/t	6.49	6.7	6.3
Processing				
Tonnes treated	kt	1,178	1,235	1,176
Head grade	g/t	6.7	6.5	6.5
Yield	g/t	6.30	6.07	6.1
Plant recovery factor	%	94.2	94.4	93.6
Total Au production	koz	238.5	241.2	229.4
	kg	7,417	7,502	7,134
Financials				
Average Au price received	US\$/oz	1,263	1,254	1,245
	A\$/oz	1,690	1,639	1,670
Exchange rate (annual average)	US\$/A\$	0.75	0.77	0.75
Cost of sales before amortisation and depreciation	A\$M	196.6	196.6	188.5
	A\$/oz	897	815	822
Capital expenditure (capex)	A\$M	97	96.2	93.8
	A\$/oz	409	399	409
All-in sustaining cost (AISC)	A\$/oz	1,374	1,276	1,301
	US\$/oz	1,026	977	971
LoM				
Mineral Reserves	Mt	3.688	3.04	2.97
Mineral Reserves head grade	g/t	4.72	5.54	5.39
Mineral Reserves	Moz	0.56	0.54	0.52

Rounding off of figures presented in this report may result in minor computational discrepancies. Where this occurs it is not deemed significant.



Australia region continued

Agnew gold mine continued

Exploration and Resource definition drilling

2017/2018 exploration expenditures are presented in the Australia regional section.

Exploration in 2018 focused on extensions at both the Waroonga and New Holland mineralised systems. Underground exploration was carried out at Waroonga North, which includes extensional drilling down dip of the mineralised lode. Extensional and in-fill drilling was also carried out on the Kath Lower and Triton lodes. Down dip extensional drilling of the Kim lode returned positive results. Step-out and in-fill drilling programmes will be completed in 2019 in the Waroonga North and FBH South areas.

The New Holland extensional and exploration drilling was conducted on five main areas, Sheba South, Lower Genesis North, Lower Genesis South, New Holland South and Himitsu. Further drilling on these targets is planned in 2019 as well as on an area to the north known as Skipper.

Early-stage exploration work was completed across the broader tenement package in 2018 and this will be continued in 2019, building a consistent pipeline of targets for the future. The Redeemer North, Zone 2 and Barren Lands region is seen as an important target area.

Mining

Current mining consists of the Waroonga and New Holland underground complexes, with the bulk of production presently sourced from the high-grade FBH lodes, Cinderella and Sheba. Drill platforms have been established for the Waroonga North lower lodes, with initial production commencing in October 2018. New Holland is in the process of identifying and extracting remnant lodes in the New Holland and Genesis ore bodies to supplement the production front established in the Cinderella and Sheba areas. Emphasis will be placed on defining a substantial mineable resource from the Sheba South area in 2019.

Mining methods

Access to the Waroonga underground mine is via a decline with the portal located in the previously mined Waroonga open pit. In 2018, production was mainly from the FBH lodes with supplementary mill feed from Kim, Main and Waroonga North. All primary infrastructures, including escape ways and ventilation shafts, are located in the hangingwall sandstone. The primary mining method at Waroonga is Long-hole sub-level stoping with paste fill.

Access to the New Holland underground mine is via twin declines with portals located in the Genesis and New Holland open pits. In 2018, the New Holland underground mine produced from Cinderella, Sheba and New Holland areas including some remnant stopes. The selection of the stoping method is dependent on the geometry of the ore structure. The primary mining method employed at New Holland is Retreat up-hole long-hole mining.

Mine planning and scheduling

The current mining areas at Waroonga include high-grade ore from Kim South and FBH, supplemented with run-of-mine (RoM) grade ore from Main North and South. At New Holland, mining in the Cinderella and Sheba areas has been the main focus. Remnant mining from New Holland has also contributed to the recent gold production. Additional mining in marginal grade areas of New Holland is incrementally costed and contributes RoM material, which assists in optimising mill throughput and equipment efficiencies.

The stope design takes practical stope layouts and geometry into consideration, as well as planning for mining losses in pillars or other parts of the resource excluded for technical reasons. Dilution material is included in the stope design. Ore loss can occur when material cannot be practically extracted from the stopes and is accounted for as part of the planning process.

LoM plans have been generated for these areas with the necessary development, advance rates and sustaining capital to support the planned production schedules and profiled grade and tonnage.

Innovation and technology

Agnew is progressing technology solutions by focusing on:

- Continued assessment of ore sorting technology opportunities both on surface and underground, following the initial trial in 2018
- Development of reporting and analytical opportunities using a telematics solution that gathers, compares and communicates vital equipment information
- Optimisation of the now owner-operated Crushing Facility to improve grind size and energy costs

Mineral Resources and Mineral Reserves

The Mineral Resources and Mineral Reserves have been updated using the planning gold price of A\$1,850/oz and A\$1,600/oz, respectively, and are reported in accordance with the SAMREC Code. The Mineral Resources are stated inclusive of Mineral Reserves. The majority of

geological and evaluation models have been updated to reflect the latest available data sets. An integrated mine design and schedule, based on current performance levels and geotechnical constraints takes cognisance of the capacities and interdependencies associated with all aspects of the mining operations at Agnew.

Mineral Resources

The Mineral Resources are classified as Measured, Indicated or Inferred, as described in the SAMREC Code. Mineral Resource categories are assigned with consideration given to geological complexity, grade variance, drill hole intersection spacing and proximity of mining development. The impacts of year-on-year changes are covered in the reconciliation section.

MINERAL RESOURCE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit and underground									
Measured	104	184	310	5.43	3.85	5.58	18	23	56
Indicated	6,601	6,751	6,462	5.49	5.75	6.19	1,165	1,248	1,286
Inferred	5,512	4,508	5,684	4.81	4.57	4.33	853	663	791
Total open pit and underground	12,218	11,444	12,456	5.18	5.25	5.32	2,036	1,934	2,133
Surface									
Measured stockpiles	128	89	92	3.15	4.30	3.08	13	12	9
Total	12,346	11,533	12,548	5.16	5.25	5.31	2,049	1,946	2,142

MINERAL RESOURCE CLASSIFICATION PER SOURCE AREA

Area	Measured			Indicated			Inferred			Total Mineral Resource		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Open pit												
Miranda pits	—	—	—	61	5.06	10	303	4.02	39	364	4.19	49
Crusader pits	—	—	—	1,001	2.39	77	45	2.99	4	1,046	2.41	81
Various – other pits	—	—	—	731	3.37	79	136	5.16	23	867	3.65	102
Total open pit	—	—	—	1,794	2.88	166	483	4.25	66	2,277	3.17	232
Underground												
Waroonga												
Kim	104	5.43	18	394	7.44	94	74	8.44	20	572	7.20	133
Main	—	—	—	619	6.91	138	138	6.63	29	757	6.86	167
FBH	—	—	—	1,476	6.42	304	639	5.40	111	2,115	6.11	415
North	—	—	—	344	12.53	139	361	8.54	99	705	10.48	238
War. other	—	—	—	585	5.94	112	207	5.87	39	792	5.92	151
Other UG	—	—	—	370	5.85	70	617	5.18	103	987	5.43	172
Genesis New Holland												
Lower Genesis	—	—	—	105	4.20	14	623	3.84	77	728	3.90	91
Sheba	—	—	—	342	4.33	48	1,130	4.07	148	1,472	4.13	196
Upper NH & G	—	—	—	528	4.40	75	755	3.91	95	1,283	4.11	170
GNH – other	—	—	—	45	4.65	7	486	4.20	66	513	4.24	72
Total underground	104	5.43	18	4,808	6.46	999	5,029	4.87	787	9,941	5.65	1,804
Surface												
Mill Stocks	128	3.15	13	—	—	—	—	—	—	128	3.15	13
Grand total	232	4.18	31	6,601	5.49	1,165	5,512	4.81	853	12,346	5.16	2,049

Australia region continued

Agnew gold mine continued

Modifying factors

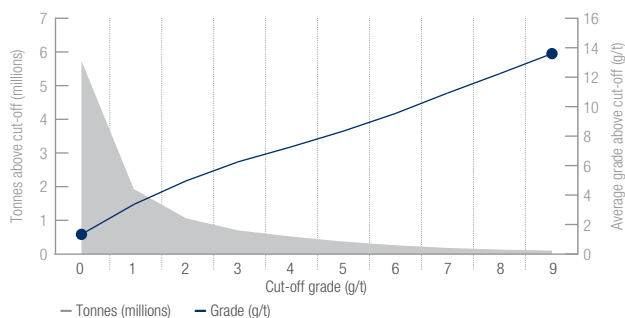
- The Measured and Indicated Mineral Resources are inclusive of Mineral Reserves
- Mineral Reserves are quoted in terms of RoM grades and tonnages as delivered to the metallurgical processing facility and are therefore fully diluted
- The Mineral Reserve statement includes only Measured and Indicated Mineral Resources, modified to produce Mineral Reserves contained within the LoM plan
- Mineral Resources and Mineral Reserves undergo regular internal and/or external audits, and any issues identified are rectified at the earliest opportunity – usually during the current reporting cycle
- As the Agnew plant has available capacity, incremental cut-off grades are applied from time-to-time in selected areas, to supplement the mill feed, benefiting the metal output, unit cost, overall cash-flow and infrastructure utilisation

		December		
Units		2018	2017	2016
Mineral Resource parameters				
Mineral Resource gold price	US\$/oz	1,400	1,400	1,400
	US\$/A\$	0.76	0.76	0.76
	A\$/oz	1,850	1,850	1,850
Cut-off for underground	g/t	2.3 – 3.7	2.4 – 3.7	2.4 – 3.7
Cut-off for open pit	g/t	0.80 – 0.99	0.80 – 0.97	0.92 – 1.06
Mineral Reserve parameters				
Mineral Reserve gold price	US\$/oz	1,200	1,200	1,200
	US\$/A\$	0.75	0.75	0.75
	A\$/oz	1,600	1,600	1,600
Cut-off for fresh ore	g/t	2.6 – 4.2	2.5 – 3.4	2.8 – 4.3
Mining recovery factor (underground)	%	90	80 – 93	80 – 95
MCF	%	100	100	100
Dilution underground	%	20	20	18
Plant recovery factor	%	92.1	92.4	92.6
Processing capacity	Mtpa	1.3	1.3	1.3

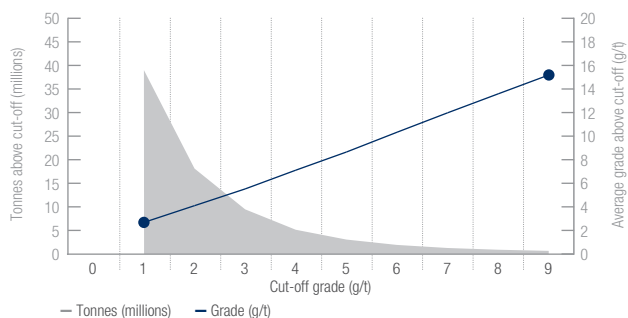
Grade tonnage curves

The grade tonnage curves for the open pit and underground Mineral Resource are presented below.

Grade tonnage curve – Open pit



Grade tonnage curve – Underground



Mineral Reserves

The Mineral Reserve estimate for Agnew is based on an appropriately detailed and engineered LoM plan. All design and scheduling work is

undertaken to an appropriate level of detail by experienced engineers using appropriate mine planning software. The planning process incorporates realistic modifying factors and the use

of appropriate cut-off grades, geotechnical criteria, mining fleet productivities, plant capacities and other techno-economic investigations.

MINERAL RESERVE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit and underground									
Proved	58	24	138	4.84	4.92	5.41	9	4	24
Probable	3,501	2,923	2,742	4.78	5.58	5.47	538	525	482
Total open pit and underground	3,560	2,947	2,880	4.78	5.58	5.46	547	529	506
Surface stockpiles									
Proved	128	89	92	3.15	4.30	3.04	13	12	9
Grand total	3,688	3,037	2,972	4.72	5.54	5.39	560	541	515

MINERAL RESERVE CLASSIFICATION PER MINING AREA

Mineral Reserves areas	Proved			Probable			Total Mineral Reserve		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Underground									
Waroonga									
Kim and Edmunds	41	5.37	7	253	7.26	59	294	7.00	66
FBH	—	—	—	1,080	5.07	176	1,080	5.07	176
Main, Main South, Rajah	—	—	—	254	5.23	43	254	5.23	43
War Nth and Kath	—	—	—	655	7.25	153	655	7.25	153
Waroonga – total	41	5.37	7	2,243	5.97	430	2,284	5.96	437
GNH – total	17	3.60	2	336	3.30	36	353	3.32	38
Total underground	58	4.84	9	2,579	5.62	466	2,637	5.60	475
Surface									
Total open pits	—	—	—	923	2.41	72	923	2.41	72
Agnew surface stockpiles	128	3.15	13	—	—	—	128	3.15	13
Grand total	186	3.68	22	3,501	4.78	538	3,688	4.72	560

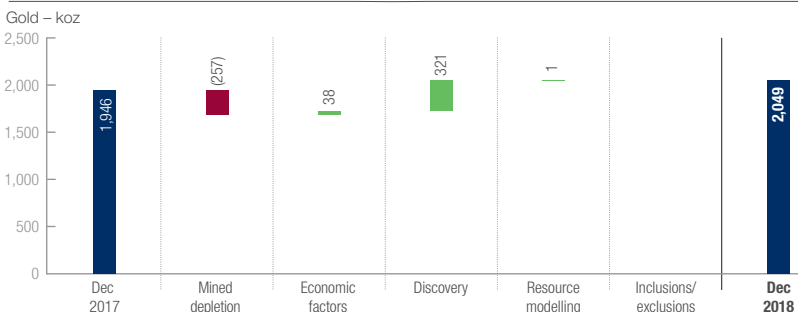
Australia region continued

Agnew gold mine continued

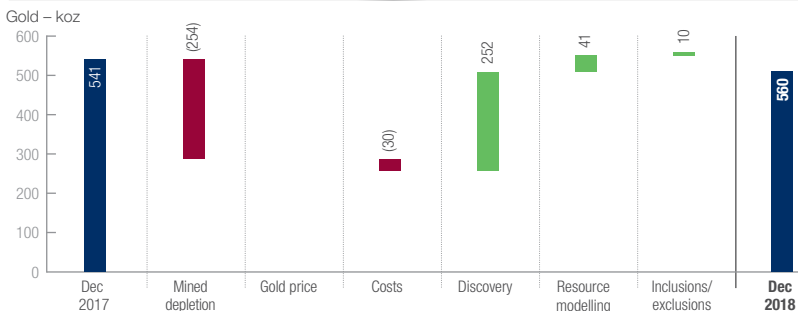
MINERAL RESOURCE AND MINERAL RESERVE RECONCILIATION YEAR ON YEAR

Factors that affected Mineral Resource reconciliation	Factors that affected Mineral Reserve reconciliation
Mining depletion	Mining depletion
Infill drilling resulted in additions at Waroonga North, Kath, FBH, Sheba, Cinderella open pit, Kim, Upper New Holland and Himitsu	Extension of Waroonga North, FBH South and Sheba South and additional open pit ounces
Increases due to resource modelling at Redeemer, Cinderella underground, 450 South open pit, Claudius underground and decreases at Lower Genesis, 200 Series, Claudius open pit and Maria open pit	Infill drilling and resource model updates increased Reserves at FBH, Waroonga North Cinderella and Kath

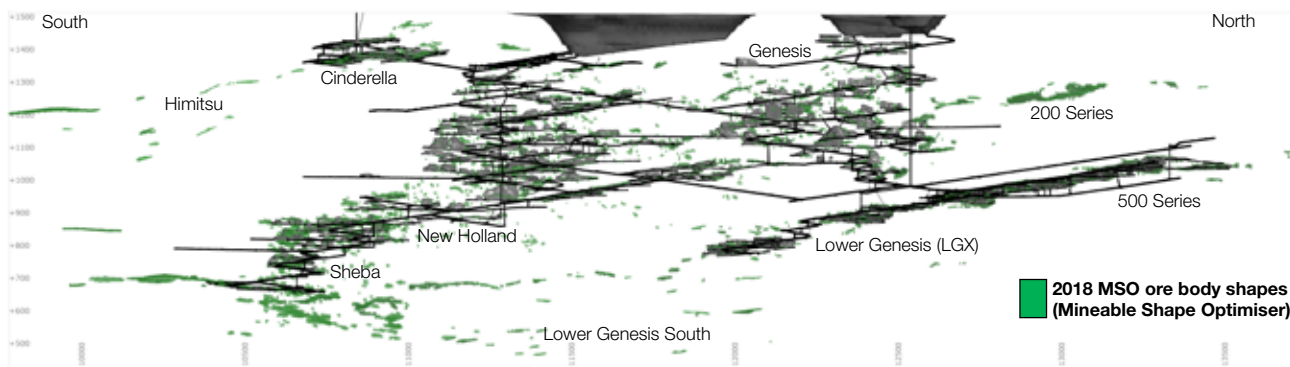
Mineral Resource reconciliation



Mineral Reserve reconciliation



Schematic north-south cross-section through the New Holland/Genesis ore bodies and mine workings

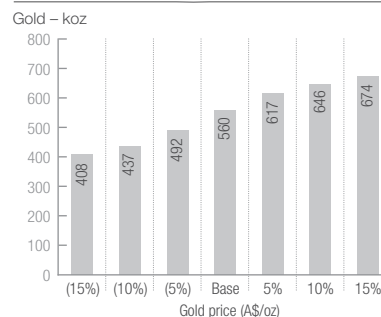


Mineral Reserve sensitivity

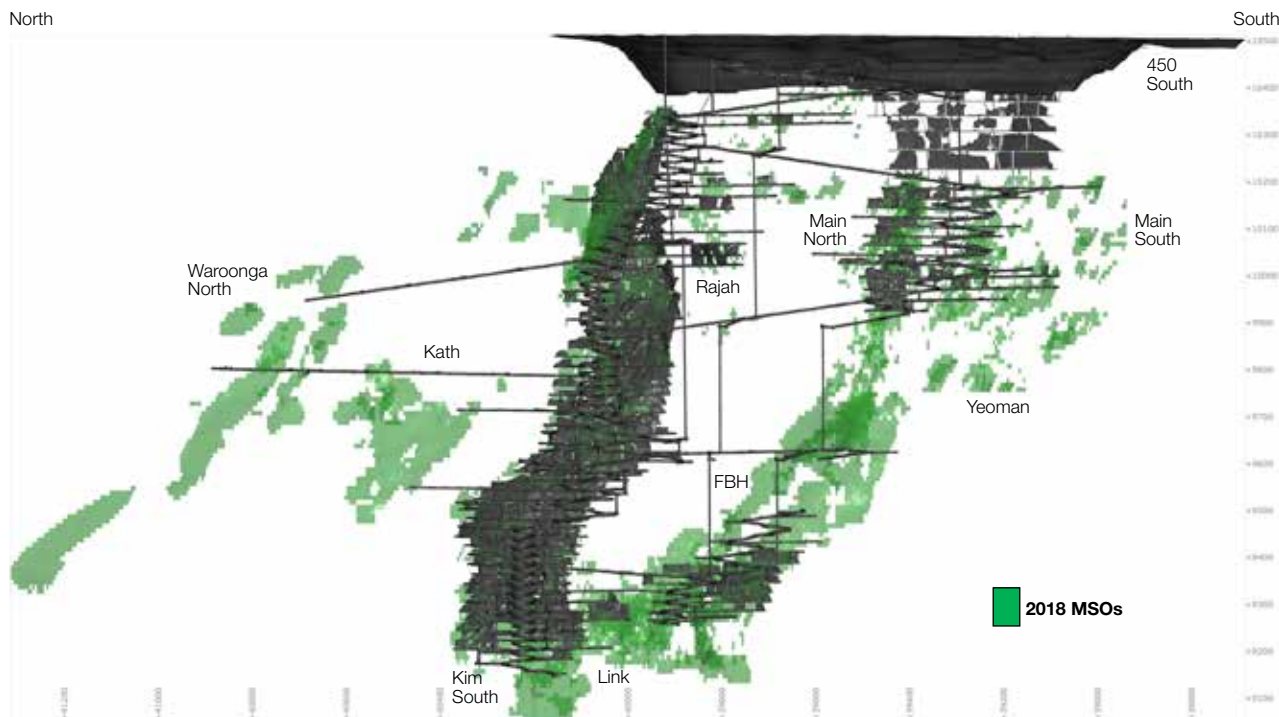
To illustrate the impact of fluctuations in gold price and exchange rates on the current declaration, Agnew has generated sensitivities with respect to Mineral Reserves. The following graph indicates the Managed Mineral Reserve sensitivity at -15% -10%, -5%, +5%, +10% and +15% to the base (A\$1,600/oz) reserve gold price.

These sensitivities (other than for the base case) are not supported by detailed plans and depletion schedules. They should only be considered on an indicative basis, specifically as such sensitivities assume 100% selectivity, without any operating cost increases.

Mineral Reserve sensitivity

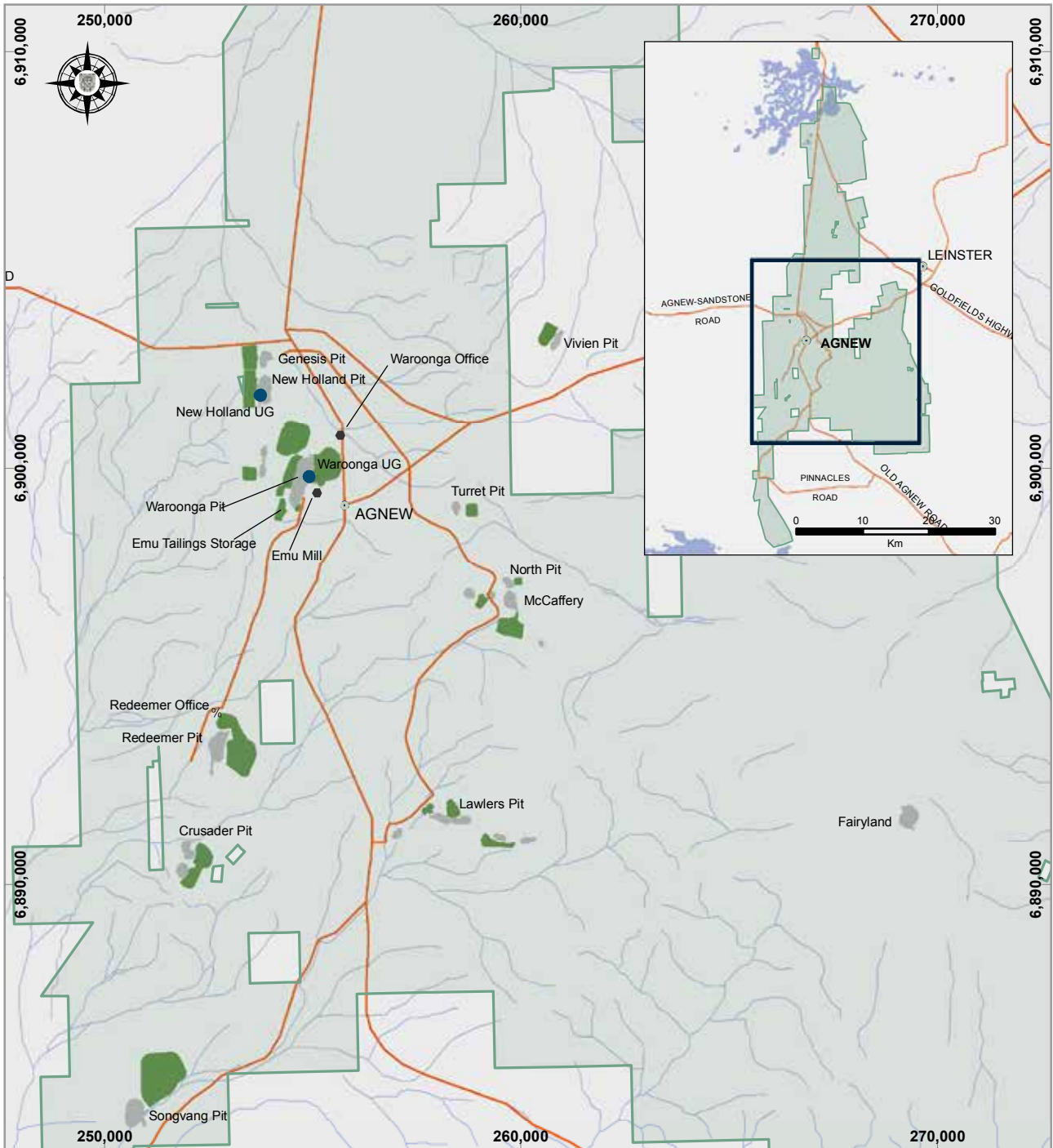


Schematic NS long-section through the Waroonga ore bodies



Australia region continued

MINE SITE INFRASTRUCTURE LAYOUT

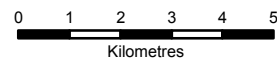


Reference

- | | | | |
|-----------------------|---|------------|---|
| Buildings | ● | UG Mine | ● |
| Main Roads | — | Open Pit | ■ |
| Ephemeral Watercourse | — | Waste Dump | ■ |
| Lease Outline | □ | | |

Gold Fields Limited Agnew Gold Mine

PLAN SHOWING MINE INFRASTRUCTURE AS AT DECEMBER 2018



Co-ordinate System: Map Grid of Australia Zone 51
(Geocentric Datum of Australia 1994)

Granny Smith gold mine



Granny Smith's track record for Reserve replacement and growth is exemplary with the Reserve base showing annual improvements for 10 consecutive years. Increases in the Mineral Resource and Mineral Reserve post depletion of 762koz (11%) and 43koz (2%), respectively, provide a strong underpin to the LoM schedules.

Extensional exploration from underground drill platforms continues to expand the resources and mining potential of the Wallaby lodes both laterally and at depth. Regional exploration programmes are focused on collecting additional foundational datasets on Lake Carey, in combination with early stage target definition on both land and lake-based projects. Geological modelling and subsequent economic assessment of the Blurry BIF prospect, on Lake Carey, is underway post the completed infill drilling campaign.

ASSET FUNDAMENTALS	
General location	Granny Smith (GSM) is situated within the Yilgarn Craton at an elevation of 400m above mean sea level (amsl) and located at latitude 28°51'09" S and longitude 122°18'35" E, and is located approximately 400km NE of the town of Kalgoorlie in the eastern Goldfields of Western Australia in the Laverton District.
Licence status and holdings	GSM is owned by GSM Mining Company (Pty) Ltd, a wholly owned subsidiary of GFI. This entity came into being on 1 October 2013, following Gold Fields' acquisition of the asset from Barrick Corporation. GSM controls exploration and mineral rights over a total area of 97,675ha, including miscellaneous and non-managed tenements (a total of 98 tenements) and has security of tenure for all current exploration and mining leases that contribute to future Mineral Reserves.
Operational infrastructure and mineral processing	GSM is currently mining four zones from the Wallaby ore body (Zones 70, 80, 90 and 100) and developing initial access to Zone 110/120. All ore zones are accessed from a single primary decline. Mining administration and maintenance is located at the Wallaby mine. Ore is processed at the GSM CIP processing plant under campaign milling conditions and is located 15km NE of the Wallaby underground mine.
Climate	The climate is semi-arid and temperatures vary from an average minimum of 4°C in June to an average maximum of 36°C in January. The average annual rainfall total is 220mm. No extreme climate conditions are experienced that materially affect mining operations.
Local geology and deposit type	<p>The regional geology of the Yilgarn Craton is described in the Australia regional section.</p> <p>The Granny Smith region is dominated by the Mt Margaret Dome in the NW and the Kirgella Dome in the SE. These domes are flanked to the east and west by NWN striking shear zones, with the central zone between the two domes being dominated by N to NNE-striking sigmoidal shear zones. These distinctly different strikes to the shear zones developed early in the tectonic evolution and resulted in a favourable architecture for late-stage orogenic gold mineralisation at Wallaby and Granny Smith.</p> <p>Orogenic greenstone gold deposits hosted in a number of different styles of lodes. The Granny Smith lodes comprise vein stock works localised by a northerly trending shear at the margin of a granodiorite. The Wallaby lodes are flat-lying alteration zones hosted within magnetite amphibole altered conglomerate.</p>
LoM	Ongoing extensional and brownfield exploration continues, which will sustain an extended LoM well beyond current reporting. It is estimated that the current Mineral Reserves are sufficient for a 12-year mine life.
Sustainable development	Cyanide Code recertified in 2014, ISO14001 and OHSAS18001 recertification completed. GSM is in compliance with all environmental legislation.

Australia region continued

Granny Smith gold mine continued

Brief history

The Goanna and Granny Smith deposits were discovered in 1979 by CSR Limited. In 1988, Placer Pacific acquired CSR's 60% interest with the remaining 40% held by Delta Gold NL.

In 1989, mining commenced in the Granny Smith pit and continued concurrent with the development of the Goanna pit, the Windich pit and nearby satellite pits. In 1992, the Keringal and Sunrise deposits were discovered. The Wallaby deposit was discovered in 1998.

Barrick acquired 100% of Placer Dome shares in 2006. The Wallaby open pit was mined from October 2001 until December 2006 and produced 13.6Mt at 3.44g/t gold for 1.5Moz of gold. Underground mining at Wallaby commenced in December 2005 and, to date, 15.6Mt at 5.71g/t for 2.9Moz has been produced.

Gold Fields acquired 100% of the Granny Smith gold mine Q4 2013 as part of the purchase of the Yilgarn South operations.

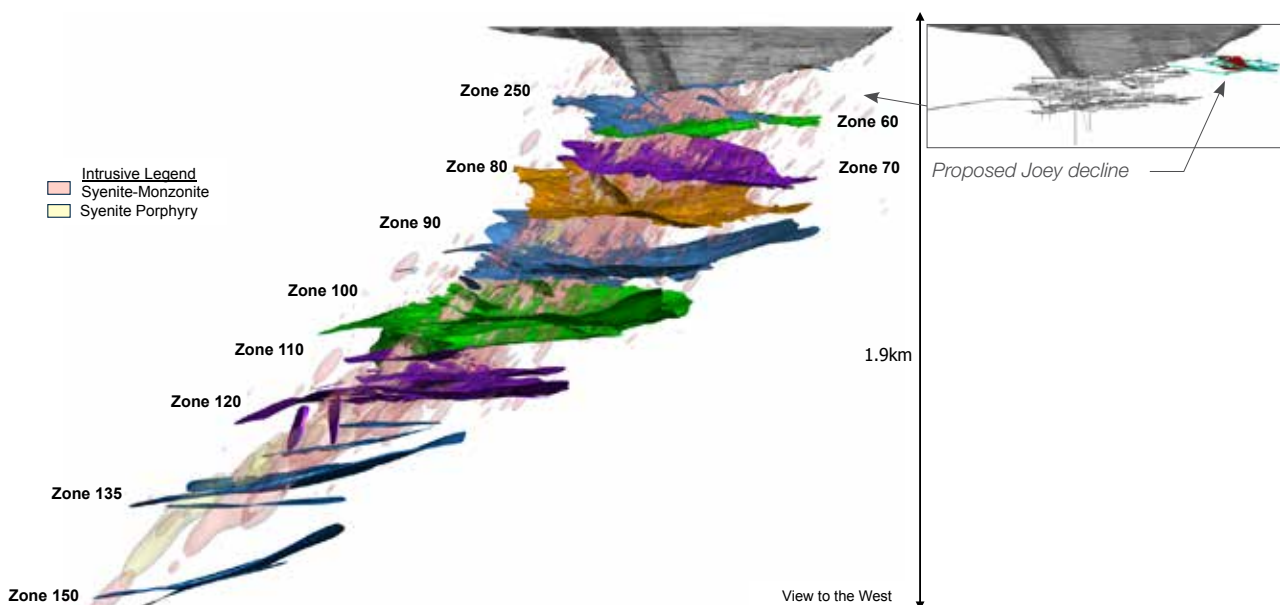
Key developments and material issues

- With mining moving below 1,000m, disciplined mining extraction sequencing and spatial compliance to plan remain paramount in optimising ore body extraction and mitigating seismic activity with increasing depth
- Ongoing exploration drilling has expanded the Mineral Resource footprint of the Zone 110/120 and Zone 135 lodes and has framed significant mineralised zones down to Zone 150 at Wallaby
- Work has commenced on setting up the Zone 110/120 ore body infrastructure, with decline development and preliminary works on the paste fill plant progressing
- The Zone 135 PFS was completed in H2 2018, supporting declaration of the maiden reserve
- The resource development strategy continues to focus on identifying the potential of the Wallaby system down to the Zone 150 level, including geotechnical and seismicity modelling and metallurgical response testing
- To increase the rigour of studies directed at mining below Zone 110/120, an holistic assessment of materials handling, ground support and ventilation options will be undertaken. This is needed to optimise the future mining model and offset increasing operating

costs linked to increased haulage, the introduction of paste fill and other additional ground support requirements

- Commencement of the Joey decline as part of a potential alternative haulage system is planned for 2019
- The Resource Optimisation Project again performed well in 2018 with targeted drilling delivering additional Reserve ounces from the shallower Wallaby Zone 250 (Joey Decline), Zone 70 and Zone 90 lodes
- Close-spaced drilling of the Blurry BIF prospect on Lake Carey is currently undergoing geological modelling after which early stage economic models will be evaluated
- Outside of Wallaby, exploration drill programmes targeting bedrock intersections below aircore anomalies commenced at several new targets
- Ongoing plant upgrades and refurbishment during 2018 has continued to improve metal recovery
- A co-funded exploration programme is ongoing supported by the Geological Society of WA – an exploration incentive scheme to encourage exploration in WA. Drilling below Zone 150 at Wallaby aims to assess geological and economic potential at depth

Granny Smith: Schematic Wallaby ore zone model looking west



Operating statistics

	Units	Historic performance		
		Dec 2018	Dec 2017	Dec 2016
Underground mining				
Total mined	kt	2,322	2,227	2,042
– Waste mined (opex)	kt	72	59	62
– Waste mined (capex)	kt	495	469	461
– Ore mined	kt	1,755	1,699	1,518
Mined grade	g/t	5.25	5.5	6.61
Processing				
Tonnes treated	kt	1,778	1,726	1,446
Head grade	g/t	5.26	5.54	6.62
Yield	g/t	4.90	5.23	6.11
Plant recovery factor	%	93.2	93.3	93.3
Total Au production	koz	280.5	290.3	283.8
	kg	8,725	9,029	8,827
Financials				
Average Au price received	US\$/oz	1,266	1,253	1,254
	A\$/oz	1,694	1,638	1,682
Exchange rate (annual average)	US\$/A\$	0.75	0.76	0.75
Cost of sales before amortisation and depreciation	A\$/oz	802	722	632
Capital expenditure (capex)	A\$/oz	376	392	427
All-in sustaining cost (AISC)	A\$/oz	1,239	1,171	1,119
	US\$/oz	925	896	834
LoM				
Mineral Reserves	Mt	12.61	12.43	9.93
Mineral Reserves head grade	g/t	5.54	5.51	5.30
Mineral Reserves	Moz	2.25	2.20	1.69

Rounding off of figures presented in this report may result in minor computational discrepancies. Where this occurs, it is not deemed significant.



Australia region continued

Granny Smith gold mine continued

Exploration and Resource definition drilling

2017/2018 exploration expenditures are presented in the Australia regional section.

In 2018, exploration focused on:

- Resource conversion and extensions to the Wallaby deposit. Expanding the Mineral Resource footprint of Zone 90/100, Zone 110/120 and Zone 135 lodes and testing mineralised zones below Zone 150
- Exploration across the broader tenement package with the aim of discovering a new ore deposit outside of Wallaby. Drill programmes targeting bedrock intersections below aircore anomalies at Troll, Hob Nob, and Darkhorse were completed
- Follow-up infill aircore drilling was completed on aircore anomalies along the Electrical Fault corridor and out in the Greater Dallas area on Lake Carey. New geological interpretations were completed
- Diamond drilling following up the preliminary bedrock target at Blurry BIF. A bedrock mineralised trend over 800m strike with gold in intermediate intrusive rocks and associated with a major N-S structural corridor was tested to 50m centres during 2018

In 2019, exploration is directed towards:

- Further drilling on the Zone 135 lode to close out open areas and define the full ore body footprint to support completion of a final PFS
- Continued Resource and Reserve growth at Wallaby through extensions to lodes, both laterally and at depth
- Continued bedrock testing of high-quality surface exploration targets generated by anomalism and refining geological

interpretations from first pass aircore programmes

- Implementation of a collaborative targeting task force with all site geologists and Perth-based technical specialists to generate and identify new quality targets in four broad areas – near Wallaby, Northern Fleet, Laverton and the regional potential

Mining

The current operations consist of the Wallaby underground mine with mining occurring on four ore zones (Zones 70, 80, 90 and 100), which form the basis for the 2019 operational plan. Decline development reached Zone 120 during 2018 with on-level capital development progressing. Development ore from both Zone 110 and 120 is scheduled as part of the 2019 mine plan, with stoping commencing late in 2019.

Mining methods

Access to the Wallaby underground mine is via a portal established within the completed Wallaby open pit. The mine operation is trackless, with truck haulage from underground via the pit ramp to the surface. The Wallaby underground mine is currently designed to exploit the stacked mineralised lodes to a depth of 1.2km.

Two primary underground mining methods are used, with minor adjustments to suit localised geometry. Inclined room and pillar is used in areas with a moderate dip (10° to 35°) and moderate width zones (4m to 6m); and transverse long-hole stoping is used in zones which are thicker (6m to 15m) with variable dips. Two other mining methods are used to a lesser extent: narrow vein long-hole stoping may be utilised in some areas with the benefit of reduced planned footwall dilution;

and bulk long-hole stoping is used in thicker zones (15m plus) under varying dip conditions.

Mine planning and scheduling

At Wallaby, the mine design takes practical stope layouts into consideration, as well as planning for mining losses in barrier pillars and stope pillars, or other parts of the resource excluded for geotechnical, accessibility or economic reasons.

The production scheduling uses rates and planning assumptions based on historical mining performance. Haulage efficiencies, geotechnical controls, ventilation requirements, mine sequencing and production cost management all remain focus areas for margin protection as mining progresses to greater depths.

Innovation and technology

The following value-add projects have been completed, or are in progress as at end 2018:

- Upgrades to the Granny Smith mill during 2018, with improved operating systems and metal recovery
- Ventilation upgrades and mine refrigeration projects were completed in 2018
- Construction of the Wallaby paste plant was completed during Q4 2018
- Implementation of the Newtrax safety solution allows real time tracking and monitoring of personnel, and can consequently be extended to real time geotechnical, fixed plant and environmental monitoring
- Completed a trial of a Long-Term Evolution (LTE 4G) network. This will allow a connected mine with high data rates up to the working face and enable remote operations and monitoring of equipment from surface

Mineral Resources and Mineral Reserves

The Mineral Resources and Mineral Reserves were updated as at December 2018, and used a gold price of A\$1,850/oz and A\$1,600/oz respectively. The December 2018

Mineral Resources have been stated inclusive of Mineral Reserves. Geological and evaluation models have been updated as at December 2018 to reflect the latest available data sets.

Mineral Resources

The Mineral Resources are classified as Measured, Indicated or Inferred, as described in the SAMREC Code. Mineral Resource categories are assigned with consideration given to geological complexity, grade variance, drill hole intersection spacing and proximity of mining development and sampling.

MINERAL RESOURCE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit									
Measured	—	—	—	—	—	—	—	—	—
Indicated	434	565	734	1.95	1.77	1.75	27	32	41
Inferred	589	840	1,456	1.95	1.90	2.10	37	51	98
Total open pit	1,023	1,404	2,190	1.95	1.85	1.98	64	84	140
Underground									
Measured	4,008	4,071	3,474	5.79	6.02	5.88	745	788	657
Indicated	27,792	21,606	18,932	5.79	5.94	5.80	5,173	4,129	3,533
Inferred	13,374	11,440	10,500	4.30	5.61	6.43	1,847	2,062	2,172
Total underground	45,174	37,117	32,906	5.35	5.85	6.01	7,766	6,979	6,362
Total stockpiles	43	66	93	5.21	5.58	6.31	7	12	19
Grand total	46,240	38,587	35,189	5.27	5.70	5.76	7,837	7,075	6,520

MINERAL RESOURCE CLASSIFICATION PER MINING AREA

Area	Measured			Indicated			Inferred			Total Mineral Resource		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Open pit												
Granny Smith	—	—	—	434	1.95	27	291	1.99	19	725	1.97	46
Hillside	—	—	—	—	—	—	297	1.91	18	297	1.91	18
Total open pit	—	—	—	434	1.95	27	589	1.95	37	1,023	1.95	64
Underground												
Granny Smith	—	—	—	3,328	3.08	330	1,625	2.72	142	4,953	2.96	472
Wallaby												
Zone 80	569	5.6	102	964	4.83	150	314	4.80	48	1,847	5.06	301
Zone 90	1,143	6.09	224	1,525	4.24	208	1,642	3.92	207	4,310	4.61	639
Zone 100	1,601	6.05	311	6,148	6.05	1,196	2,334	3.75	281	10,083	5.52	1,789
Zone 110/120	—	—	—	9,809	7.07	2,229	2,369	4.91	374	12,177	6.65	2,603
Zone 135	—	—	—	4,135	5.98	795	3,016	5.80	563	7,151	5.90	1,357
Other	695	4.83	108	1,883	4.39	266	2,074	3.48	232	4,652	4.05	606
Total underground	4,008	5.79	745	27,792	5.79	5,173	13,374	4.30	1,847	45,174	5.35	7,766
Surface												
Surface stockpiles	43	5.21	7	—	—	—	—	—	—	43	5.21	7
Grand total	4,051	5.78	753	28,226	5.73	5,200	13,963	4.20	1,884	46,240	5.27	7,837

Australia region continued

Granny Smith gold mine continued

Modifying factors

- The Measured and Indicated Mineral Resources are inclusive of Mineral Reserves
- Mineral Reserves are quoted in terms of RoM grades and tonnages as delivered to the metallurgical

processing facility and are therefore fully diluted

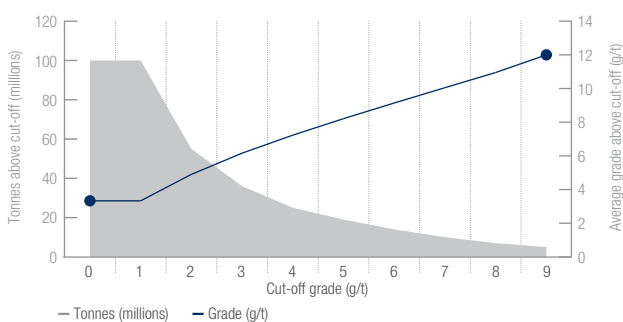
- Mineral Reserve statement includes only Measured and Indicated Mineral Resources, modified to produce Mineral Reserves and contained within the LoM plan

- Mineral Resources and Mineral Reserves undergo regular internal and/or external audits, and any issues identified are rectified at the earliest opportunity – usually during the current reporting cycle

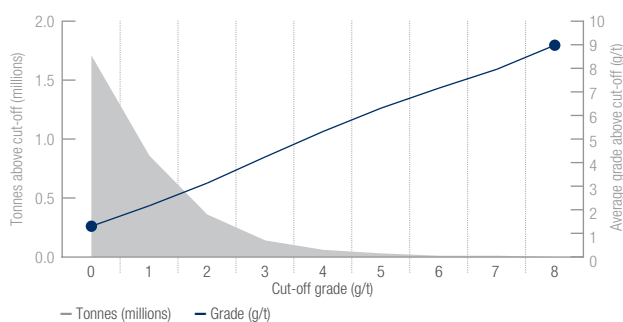
	Units	December		
		2018	2017	2016
Mineral Resource parameters				
Mineral Resource Au price	US\$/oz	1,400	1,400	1,400
	US\$/A\$	0.76	0.76	0.76
	A\$/oz	1,850	1,850	1,850
Cut-off for open pit	g/t	0.60 – 0.63	0.57 – 0.63	0.63
Cut-off for underground	g/t	2.0 – 2.8	2.0 – 2.8	2.0 – 2.9
Mineral Reserve parameters				
Mineral Reserve Au price	US\$/oz	1,200	1,200	1,200
	US\$/A\$	0.75	0.75	0.75
	A\$/oz	1,600	1,600	1,600
Cut-off for underground	g/t	2.4 – 3.2	2.4 – 3.1	2.4 – 3.1
Mining recovery factor (underground)	%	91	91	91
MCF	%	100	100	100
Dilution underground	%	15	15	15
Plant recovery factor	%	92.2	92.8	92.6
Processing capacity	Mtpa	3.5	3.5	3.5

The grade tonnage curves for the underground and open pit Mineral Resource are presented below.

Grade tonnage curve – Underground



Grade tonnage curve – Open pit



Mineral Reserves

The Mineral Reserve estimate for Granny Smith is based on a detailed and engineered LoM plan. All design and scheduling work is undertaken by experienced engineers using appropriate mine planning software.

The planning process incorporates realistic modifying factors and the use of appropriate cut-off grades, geotechnical criteria, mining fleet productivities, operational capacities and constraints and other techno-economic investigations.

Scheduling of all required capital requirements is accommodated in the financial cash-flow model to ensure appropriately funded and sustainable operations over the LoM.

MINERAL RESERVE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Underground									
Proved	1,106	1,498	1,383	4.92	4.97	5.38	175	239	239
Probable	11,465	10,865	8,457	5.60	5.59	5.28	2,064	1,951	1,435
Total underground	12,571	12,363	9,840	5.54	5.51	5.29	2,239	2,191	1,674
Surface									
Proved	43	66	93	5.21	5.58	6.31	7	12	19
Grand total	12,614	12,430	9,933	5.54	5.51	5.30	2,246	2,203	1,693

MINERAL RESERVES CLASSIFICATION PER MINING AREA

Area	Proved			Probable			Total Mineral Reserve		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Underground									
(Z250, 60, 70 and 80)	215	3.88	27	878	3.60	102	1,093	3.66	128
Z90	284	6.47	59	113	3.07	11	397	5.50	70
Z100	607	4.57	89	1,857	6.01	359	2,464	5.65	448
Z110	—	—	—	1,067	5.62	193	1,067	5.62	193
Z120	—	—	—	5,170	6.07	1,009	5,170	6.07	1,009
Z135	—	—	—	2,380	5.10	390	2,380	5.10	390
Total underground	1,106	4.92	175	11,465	5.60	2,064	12,571	5.54	2,239
Surface									
Surface stockpiles	43	5.21	7	—	—	—	43	5.21	7
Grand total	1,148	4.93	182	11,465	5.60	2,064	12,614	5.54	2,246

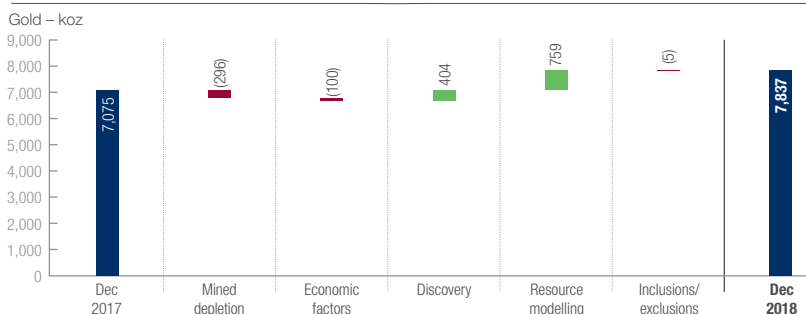
Australia region continued

Granny Smith gold mine continued

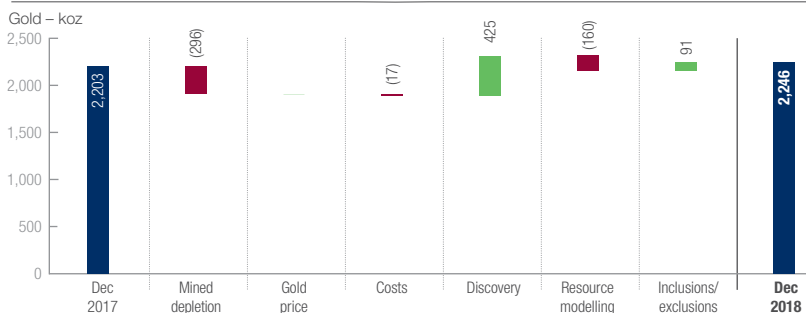
MINERAL RESOURCE AND MINERAL RESERVE RECONCILIATION YEAR ON YEAR

Factors that affected Mineral Resource reconciliation	Factors that affected Mineral Reserve reconciliation
Mining depletion from Zones 70, 80, 90, 100 and 110/120	Mining depletion from Zones 70, 80, 90, 100 and 110/120
Increase of 760koz in Wallaby underground from remodelling, primarily in Zones 250/60, 100 and 110/120	Maiden Reserve from Zone 135 following conversion of new Indicated Resources and completion of a PFS (390koz)
Increase in ounces from resource extension discoveries, primarily in Zones 90, 100 and 135	New ore body extension to Zone 250 lode (34koz) following resource optimisation drilling
Minor decreases to the Granny Smith and Hillside open pit Resources due to nominally higher cut-off grades	Decrease of 160koz in Zones 100/110 and 120 due to updated geotechnical and mine designs incorporating increased pillar sizes. This was done in response to predicted levels of seismic activity in line with increasing depth. Studies will be updated as more empirical data is acquired

Mineral Resource reconciliation



Mineral Reserve reconciliation

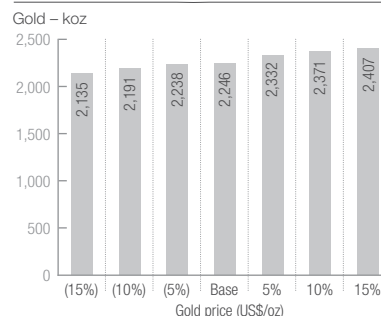


Mineral Reserve sensitivity

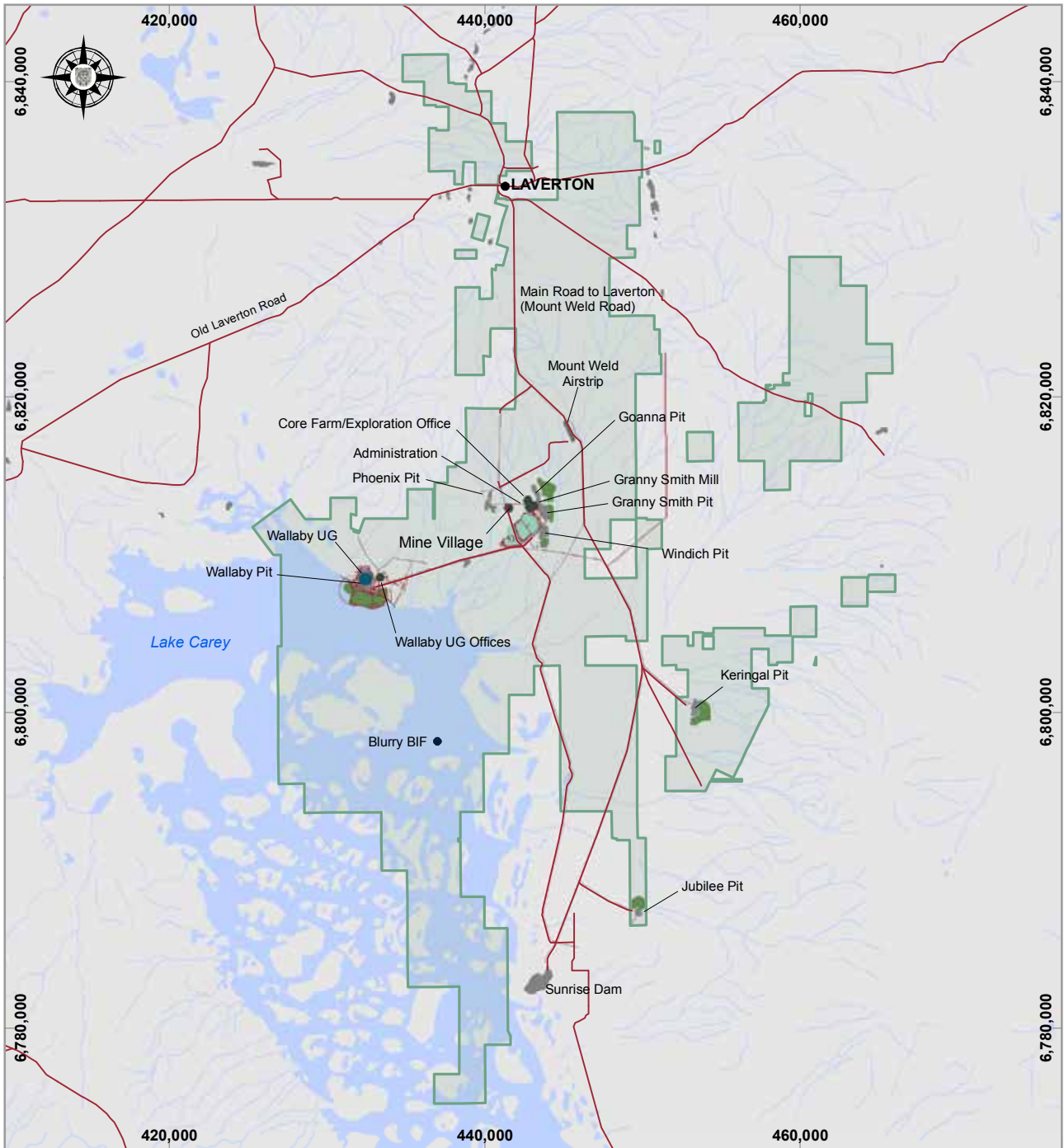
To illustrate the impact of fluctuations in gold price and exchange rates on the current declaration, Granny Smith has generated sensitivities with respect to Mineral Reserves. The following graph indicates the Managed Mineral Reserve sensitivity at -15%, -10%, -5%, +5%, +10% and +15% to the base (A\$1,600/oz) reserve gold price.

These sensitivities (other than for the base case) are not supported by detailed plans and depletion schedules. They should only be considered on an indicative basis, specifically as such sensitivities assume 100% selectivity, without any operating cost increases.

Mineral Reserve sensitivity



MINE SITE INFRASTRUCTURE LAYOUT



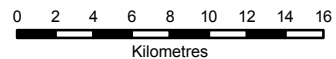
Reference

- Buildings
- UG Mines
- Main Roads
- Ephemeral Watercourse
- Lease Outline
- Open Pit
- Stockpiles
- Tailings Dams
- Waste Dump



**Gold Fields Limited
Granny Smith Gold Mine**

PLAN SHOWING MINE INFRASTRUCTURE AS AT DECEMBER 2018



Co-ordinate System: Map Grid of Australia Zone 51
(Geocentric Datum of Australia 1994)

Australia region continued

St Ives gold mine



St Ives had a good 2018, increasing its Resource and Reserve base net of depletion from the increasingly important and expanding Invincible underground camp, Neptune open pit and the new high-grade underground deposit at Hamlet North. Brownfield exploration across the expansive tenement package is continuing to deliver promising early stage results.

Full production commenced on schedule from Invincible underground in early 2018. Development of the access decline to Invincible South was well advanced during 2018, along with the development of an exploration drill drive and access to Hamlet North.

As drilling continues, additional ore shoots with increasing continuity are being identified at Greater Invincible and prospective new open pit target areas in the Lefroy Exploration JV, and Kambalda West and Western Basin areas will be tested in 2019.

The palaeochannel gold project will be further advanced in 2019, targeting a milestone viability decision in H2 2019.

ASSET FUNDAMENTALS	
General location	The St Ives mining operations extend from five to 25km SSW of the town of Kambalda in Western Australia, approximately 630km east of Perth at latitude 31°12' S and longitude 121°40' E. The nearest major settlement is the town of Kalgoorlie situated 80km to the north, with well-established power grids, access roads and supporting infrastructure.
Licence status and holdings	St Ives controls prospecting, exploration, mining and miscellaneous tenements over a total area of 168,205ha (inclusive of 43 non-managed leases totalling 6,023ha, and 13 JV tenements totalling 37,213ha where St Ives is currently earning an interest).
Operational infrastructure and mineral processing	St Ives currently operates two underground mines, which are accessed via declines, and two open pits, a centralised administrative office, an engineering workshop and a 4.7Mtpa CIP processing plant.
Climate	St Ives is situated in an area of arid bush land. While occasional storm activity may cause minor delays to open pit mining operations, the climatic conditions do not materially impact on the normal operations of the site.
Local geology and deposit type	<p>St Ives lies within the Kambalda domain, a subset of the Norseman-Wiluna Belt. The Kambalda domain is bound by the NNW trending Boulder-Lefroy fault (BLF) and Zuleika shear. The region has undergone four compressional events predated by early extension and has been metamorphosed to upper greenschist or lower amphibolite facies.</p> <p>The main structural feature of the St Ives area is the gently south-plunging Kambalda anticline, which extends 35km from the south end of the Kambalda dome to the Junction mine. The majority of known gold deposits are proximal to the trace of the anticlinal axis. A major second order structure known as the Playa shear splays off the BLF Shear Zone and can be traced through the St Ives field for a distance in excess of 10km.</p> <p>There are several styles of gold mineralisation at St Ives. Individual deposits may contain more than one of these styles:</p> <ul style="list-style-type: none"> ■ Lode mineralisation: Archaean lode mineralisation typically consisting of 0.5m to 20m-wide mesothermal vein complexes that may also have hydraulic breccias and/or mylonites ■ Supergene mineralisation: Broad zones of flat-lying gold mineralisation in weathered Archaean and overlying tertiary sediments ■ Palaeoplacer mineralisation: Placer deposits hosted by palaeochannels in the unconsolidated tertiary sediments that overlie the Archaean basement <p>Archaean orogenic greenstone gold hosted in a number of different styles of mineralisation. Lode, supergene and palaeoplacer-style deposits characterise the range of ore body types.</p>
LoM	Ongoing extensional and brownfield exploration continues and could increase the LoM given the prevailing Inferred Resource and strengthening exploration pipeline. It is estimated that the current known Mineral Reserves will be depleted in 2025 (seven years).
Sustainable development	The mine maintained OHSAS18001 Occupational Health and Safety Management System certification and ISO14001 Environmental Management System certification. St Ives was certified as fully compliant with the ICMC in 2013. In late 2016, St Ives was found to be non-compliant to the code. Full certification was regained in April 2017 and retained in 2018.

Brief history

Gold was discovered at the Kambalda Red Hill camp in 1897 and, in the following 10 years, other gold-bearing locations, such as Victory, were discovered. In 1981, the Victory-Defiance complex (Leviathan area) was discovered.

Gold production commenced at St Ives using a 0.5Mtpa treatment plant (later expanded to 1.2Mtpa). In 1988, a new 3.1Mtpa CIL facility was constructed at St Ives. During 2001, a 2Mtpa heap leach facility was commissioned during the period when Gold Fields acquired St Ives. In 2004, the 4.7Mtpa Lefroy mill was constructed and fully commissioned in early 2005.

From 2007 to 2012, a number of economic deposits were discovered and mined. These include Cave Rocks (2007), Belleisle (2007), Hamlet (2009), Athena (2010) and Invincible (2012).

Production from the Neptune palaeochannel open pit commenced in 2013 and will continue through 2019.

The ongoing exploration strategy delivered the Invincible camp in 2013, which remains the mainstay of mine

production. First production from Invincible started in Q1 2015. In 2017, development commenced into the Invincible underground deposit with full production reached in 2018. Development of the access decline to the Invincible South underground deposit commenced in 2018, with level development to commence in 2019. Exploration of the numerous open-ended extensions to the Invincible deposit will continue in 2019.

Key developments and material issues

- Emphasis in 2019 will be on the continued expansion of the Invincible underground operations with first ore from Invincible South and commencement of the Hamlet North project
- Cornerstone production moves increasingly to UG over the next two years from the Invincible mining fronts and Hamlet North
- Geotechnical challenges are being experienced at Invincible underground resulting from the mudstone rock mass behaviour, and various ground support contingencies are being assessed. A study is underway to implement paste fill and, in the meantime,

pillar modifications and monitoring will be implemented

- Highly prospective targets are being explored along strike of Invincible South in the Greater Invincible area with additional resources likely to be added in 2019
- Follow-up work and drilling on targets generated from the Seismic Cube surveys is providing an exciting new exploration tool for the Victory-Defiance complex area
- The mining mix is changing from open pit to underground operations in the medium term, and discovery of new sizeable open pit opportunities has been prioritised
- Cave Rocks' remnant mining will be completed and the mine closed in 2019
- Mill upgrades continue to be implemented to enhance recovery from multiple ore sources and lake sediments
- The geotechnical drilling programme and Advanced Scoping Study were successfully completed for the palaeochannel project with stage 1 pre-feasibility mining studies to be developed and progressed in 2019



Australia region continuedSt Ives gold mine continued

OPERATING STATISTICS

	Units	Historic performance		
		Dec 2018	Dec 2017	Dec 2016
Total mined	kt	22,044	43,012	43,973
– Waste mined	kt	17,737	38,547	39,674
– Ore mined	kt	4,307	4,466	4,300
Mined grade	g/t	3.0	3.1	2.9
Open pit mining				
Open pit mined	kt	20,757	42,148	43,114
– Waste mined	kt	17,362	38,166	39,442
– Ore mined	kt	3,396	3,982	3,673
Mined grade	g/t	2.7	2.9	2.6
Strip ratio (waste/tonne ore)	ratio	5.1	9.6	10.7
Underground mining				
Underground mined	kt	1,287	865	859
– Waste mined	kt	375	381	232
– Ore mined	kt	911	484	627
Mined grade	g/t	4.1	4.1	5.1
Processing				
Total plant treatment (excl toll)	kt	4,250	4,198	3,953
CIL tonnes treated (incl toll)	kt	4,250	4,198	4,046
Head grade	g/t	2.88	2.96	3.00
Yield	g/t	2.69	2.70	2.84
CIL Plant recovery factor (excl toll)	%	92.5	92.5	92.8
Au production ex CIL Plant (incl GFI Toll payment)	koz	366.9	363.9	362.2
Tonnes to heap leach	kt	0	0	0
Yield ex-heap leach (sold)	koz	0	0	0.7
	g/t	n/a	n/a	n/a
Total Au sold (CIL and HL)	koz	367.0	363.9	362.9
	kg	11,414	11,319	11,287
Financials				
Average Au price received	US\$/oz	1,266	1,257	1,246
	A\$/oz	1,695	1,642	1,672
Exchange rate (annual average)	US\$/A\$	0.75	0.77	0.75
Cost of sales before amortisation and depreciation	A\$M	249	207	244
	A\$/oz	678	569	672
Capital expenditure (capex)	A\$M	170	204	188
	A\$/oz	464	561	517.4
All-in sustaining cost (AISC)	A\$/oz	1,207	1,198	1,273
	US\$/oz	902	916	949
LoM				
Mineral Reserves	Mt	19.09	19.42	21.51
Mineral Reserves head grade	g/t	2.84	2.51	2.52
Mineral Reserves	Moz	1.74	1.57	1.74

Rounding off of figures presented in this report may result in minor computational discrepancies. Where this occurs, it is not deemed significant. During 2016, a small amount of ore was toll treated and St Ives received 1.9koz in payment.

Exploration and Resource definition drilling

2017/2018 exploration expenditures are presented in the Australia regional section.

In June 2018, St Ives entered into a Farm-in Agreement with Hogans Resources (Pty) Ltd and Lefroy Exploration JV (LEX JV), where St Ives may earn up to 70% equity in the LEX JV tenements through exploration expenditure. This agreement allows St Ives to earn exploration and mineral rights over a total additional area of 37,017ha. The site exploration team is supported by in-house geophysics, regional and corporate technical teams. Rigorous sampling and assaying QA/QC protocols are maintained on all exploration programmes. Industry-leading practice is applied for data acquisition and accredited assay laboratories are used, which are regularly reviewed both internally and externally.

In 2018, extensional exploration targeted the Invincible underground trend, which will continue in 2019, and Hamlet North. The high-grade Hamlet North deposit was drilled to Reserve status in the first half of 2018 allowing for the planning of underground access for a drill drive to commence. Additional brownfield exploration continues to focus on the Eastern Causeway, Kambalda West and the Speedway trends using a combination of auger, aircore and RC drilling, geochemistry and geophysics to generate an integrated prospectivity model to prioritise and direct future investment. The Speedway trend is a 20km plus prospective belt where exploration success was achieved in 2017, extending the Invincible group of deposits. Systematic geochemical testing of the entire trend was

completed in 2018. Follow-up RC drilling of the southern Speedway Trend identified significant mineralisation at the Venom prospect. A 3D Seismic Cube was surveyed over the Victory Defiance complex in Q3 2017. Data from this survey was interpreted in 2018, with drill testing of initial targets generated conducted in the second half of 2018.

Notable activities include foundational data set and auger geochemical sampling at Kambalda West aimed at identifying targets for follow-up in 2019, and the Southern St Ives areas will undergo auger geochemical sampling in 2019.

Mining

Conventional drill and blast with truck and shovel mining techniques are employed at all open pits. Grade control is generally by way of inclined RC drilling on grids determined by the ore body characteristics. Load-and-haul is carried out by 90 – 180t dump trucks and 150 – 350t excavators in backhoe and/or face shovel configuration. Mining benches vary from 5m to 10m, and are excavated in passes (flitches) of 2.5m to 3m per flitch. Gold mineralisation is mined selectively to cut-off grades, and segregated into grade ranges to balance the ore production and processing capacities onsite and to maximise cash-flow.

Underground mines at St Ives are commonly extensions of open pit mines. Mines are accessed via declines, drives are developed to access the ore and future stoping production areas. Underground mining at St Ives is predominantly mechanised and conducted by long-hole open stoping (LHoS), with subordinate cut-and-fill and room-and-pillar stoping for the shallower dipping ore bodies. Paste fill and

LHoS are used where mandated by geotechnical factors. Electric-hydraulic drilling jumbos and rubber-tired diesel-powered load, haul, dump machine are used for development and stoping, while trucks are used for load-and-haul operations. Ore from both open pit and underground operations is transported with road trains from individual mining operations to the central St Ives RoM pad.

Mine planning and scheduling

Cut-off grades are used to define potentially economic underground mining panels, taking into consideration direct mining and processing costs, company set commodity prices and other parameters. The economic viability of future mining panels is tested by determining whether the margin, after applying the appropriate cut-off grade, is sufficient to cover the required capital development and mining costs.

Open pit optimisation software, in conjunction with economic parameters and physical constraints, is used to generate a series of nested pits for open pit mining. An optimal shell is then selected and a detailed design used to confirm the mineability.

Underground mining methods are largely determined by the geometry of the mineralised zones and evaluation may involve review of more than one method. Fit-for-purpose proprietary software is used for mine design and scheduling.

Mine planning is based on 3D resource block models of in situ mineralisation, with allowances made for minimum mining widths, dilution and ore loss in line with the mining method being considered.

Australia region continued

St Ives gold mine continued

The next major mine project at St Ives will be the development of the Invincible South underground mine. Decline development extending from the Invincible underground decline to access Invincible South, commenced in 2018 and was well advanced by year end. Development of the Hamlet North deposit commenced in 2018 with the construction of a drill drive from the Hamlet mine. Mine access to the deposit will commence from the drill drive access in 2019.

Additionally, development and mining of Neptune Stage 5 and 6 pits, which commenced in 2017, will continue in 2019.

Infrastructure, waste disposal and ore stockpile management requirements are incorporated into the planning process. Ore stockpile management at St Ives strives to optimise the metallurgical blend requirements of the Lefroy Mill, with regard to variable material types and grade management. To ensure ICMC compliance, a cyanide destruct circuit has been added to the St Ives processing configuration.

Innovation and technology

Advancement of value-add preliminary stage technology solutions is focusing on the following:

- Installing proximity detection systems in the open pit and underground operations
- Developing digitally enabled drilling practices with high precision GPS
- Installation of fibre optic backbone and high bandwidth WiFi at Invincible underground and Invincible South
- Deployment of Newtrax safety systems as part of the proximity detection deployment
- Use of real-time equipment data collection and ventilation on demand



Mineral Resources and Mineral Reserves

Geology and evaluation models have been updated to reflect the latest available data sets. An integrated mine design and schedule is based on current performance levels and takes cognisance of all constraints and capacities inherent to the mining operations at St Ives. The Mineral Resources and Mineral Reserves have been updated using the current planning gold price of A\$1,850/oz and A\$1,600/oz respectively, and reported in accordance with the SAMREC Code.

The Mineral Resources are classified as Measured, Indicated and Inferred as defined in the SAMREC Code. Increasing levels of geoscientific knowledge and confidence are based on geological understanding, grade variance, drill hole/sample spacing, mining development (amount of exposed and mapped mineralisation) and mining history. The economic evaluation is based on the Company planning gold price, taking into account estimates of all costs, the impact of modifying factors such as mining dilution and metal/ore recovery, processing recovery and

royalties. All Mineral Resources and Mineral Reserves reported are 100% attributable to St Ives.

Mineral Resources

The Mineral Resources increased post depletion by 2% to 3.93Moz, primarily due to discovery at Hamlet North and further growth from the Invincible underground trend. The surface sources include stockpiles that are supported by adequate sampling, and are thus classified as Measured Mineral Resources.

MINERAL RESOURCE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit and underground									
Measured	2,154	1,356	2,291	3.58	3.89	3.26	248	169	240
Indicated	19,815	22,164	17,980	4.13	3.85	3.81	2,628	2,744	2,203
Inferred	7,779	7,467	6,538	3.58	3.31	3.56	895	795	747
Total open pit and underground	29,747	30,987	26,809	3.94	3.72	3.70	3,771	3,709	3,191
Surface									
Measured stockpiles	3,436	3,457	3,317	1.42	1.25	1.00	157	139	107
Grand total	33,183	34,445	30,126	3.68	3.47	3.40	3,928	3,847	3,297



Australia region continuedSt Ives gold mine continued

MINERAL RESOURCE CLASSIFICATION PER MINING AREA

Area	Measured			Indicated			Inferred			Total Mineral Resource		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Open pit												
APN	—	—	—	315	7.70	78	—	—	—	315	7.70	78
Incredible	—	—	—	1,291	1.88	78	445	2.16	31	1,736	1.96	109
Invincible Pit	307	3.06	30	412	3.55	47	41	3.49	5	759	3.35	82
Justice	—	—	—	547	2.64	46	169	3.09	17	716	2.75	63
Neptune	746	1.97	47	3,102	2.99	298	776	2.39	60	4,623	2.72	405
Pistol Club	—	—	—	538	3.77	65	41	1.82	2	579	3.63	68
Santa Ana	—	—	—	1,433	2.27	105	84	2.03	6	1,517	2.26	110
Yorick	—	—	—	90	4.54	13	429	3.40	47	518	3.60	60
Other	25	2.22	2	2,076	2.98	199	861	2.82	78	2,963	2.92	278
Total open pit	1,077	2.28	79	9,803	2.95	929	2,846	2.68	245	13,727	2.84	1,253
Underground												
Argo	151	4.82	23	481	4.67	72	187	3.75	23	819	4.49	118
Cave Rocks	262	4.75	40	210	4.55	31	76	3.63	9	548	4.52	80
Hamlet	234	5.73	43	443	4.66	66	30	4.32	4	706	5.00	114
Hamlet North	—	—	—	874	8.87	249	132	7.64	33	1,007	8.71	282
Invincible UG	219	5.66	40	1,798	4.33	250	1,185	4.04	154	3,202	4.31	444
Invincible Deeps	—	—	—	2,052	5.58	368	884	5.18	147	2,937	5.46	516
Invincible South	—	—	—	1,684	7.25	393	872	5.04	141	2,556	6.50	534
North Orchin	—	—	—	570	4.28	78	699	3.51	79	1,269	3.85	157
Sirius	211	3.29	22	1,899	3.13	191	867	2.17	61	2,977	2.86	274
Total underground	1,077	4.87	169	10,011	5.28	1,699	4,933	4.10	650	16,021	4.89	2,518
Surface												
Surface stockpiles	3,436	1.42	157	—	—	—	—	—	—	3,436	1.42	157
Grand total	5,590	2.25	405	19,815	4.13	2,628	7,779	3.58	895	33,183	3.68	3,928

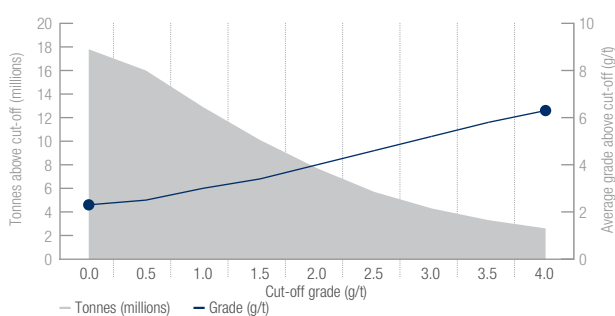
Modifying factors

- All Mineral Reserves are quoted in terms of RoM grades and tonnages, as delivered to the metallurgical processing facilities, and are therefore fully diluted
- The Measured and Indicated Mineral Resources are inclusive of Mineral Reserves
- The Mineral Reserve Statements include only Measured and Indicated Mineral Resources, modified to produce Mineral Reserves that are contained in the LoM plan
- Mineral Resources and Mineral Reserves undergo regular internal and/or external audits, and any issues identified are rectified at the earliest opportunity – usually during current reporting cycle

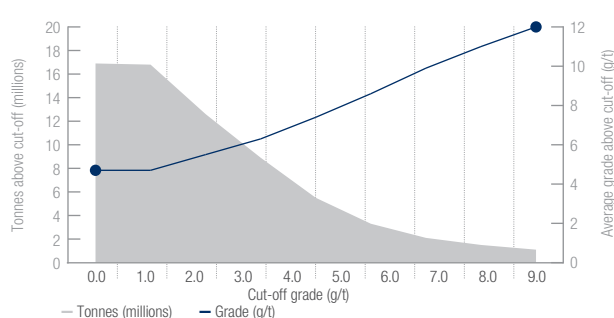
		December		
Units		2018	2017	2016
Mineral Resource parameters				
Mineral Resource Au price	US\$/oz	1,400	1,400	1,400
	A\$/oz	1,850	1,850	1,850
Cut-off for oxide ore	g/t	0.74 – 1.03	0.74 – 0.93	0.55 – 0.96
Cut-off for fresh ore	g/t	0.74 – 3.3	0.74 – 3.1	0.55 – 3.2
Cut-off for mill feed	g/t	0.74 – 1.03	0.74 – 0.95	0.55 – 0.96
Cut-off for open pit	g/t	0.74 – 1.03	0.74 – 0.95	0.55 – 0.96
Cut-off for underground	g/t	2.0 – 3.3	1.8 – 3.1	2.4 – 3.2
Mineral Reserve parameters				
Mineral Reserve Au price	US\$/oz	1,200	1,200	1,200
	A\$/oz	1,600	1,600	1,600
Cut-off for oxide ore	g/t	0.35 – 0.40	0.4	0.5
Cut-off for fresh ore	g/t	0.35 – 2.7	0.4 – 2.9	0.5 – 3.0
Cut-off for mill feed underground	g/t	2.0 – 2.7	2.3 – 2.9	2.6 – 3.0
Cut-off for mill feed open pit	g/t	0.35 – 0.40	0.4	0.5
Mining recovery factor (underground)	%	90 – 97	90 – 97	90 – 95
Mining recovery factor (open pit)	%	91 – 100	97 – 98	95 – 98
Strip ratio (waste:ore)	ratio	5.7	6.2	6.6
Mine Call Factor (MCF)	%	100	100	100
Dilution open pit	%	15 – 52	15 – 50	2 – 49
Dilution underground	%	11 – 25	12 – 25	15 – 25
Plant recovery factor	%	69 – 96	69 – 96	78 – 94
Processing capacity	Mtpa	4.7	4.7	4.7

Grade tonnage curves for the underground and open pit Mineral Resource are presented below:

Grade tonnage curve – Open pit



Grade tonnage curve – Underground



Australia region continued

St Ives gold mine continued

Mineral Reserves

Mineral Reserves at St Ives increased, post mining depletion, by 11% to 1.74Moz in 2018. The dominant contributors to Mineral Reserves are extensions to footprints in the Invincible open pit, Neptune open pit and Invincible underground, with maiden Reserves at Invincible Deeps and the high-grade Hamlet North deposit.

The uncertainty around the timing of discoveries and lead times to bring a new mine into production are characteristic of orogenic-style operations but property endowment and a strong project pipeline continues to warrant expenditure in line with the strategic plan. The Mineral Reserves are derived from the LoM plan, which is supported by a detailed design and schedule that

takes account of cut-off grades, mining fleet productivities, prevailing geotechnical factors that direct optimal sequencing, and incorporates appropriate modifying factors. Surface sources include stockpiles. Capital requirements are accommodated in the cash-flow model to ensure sustainable operations over the LoM.

MINERAL RESERVE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit and underground									
Proved	1,648	1,131	2,797	2.21	3.08	2.15	117	112	193
Probable	14,006	14,831	15,398	3.26	2.76	2.91	1,467	1,318	1,441
Total open pit and underground	15,654	15,961	18,195	3.15	2.79	2.79	1,584	1,430	1,634
Surface									
Proved	3,436	3,457	3,317	1.42	1.25	1.00	157	139	107
Grand total	19,090	19,419	21,512	2.84	2.51	2.52	1,741	1,568	1,740



MINERAL RESERVE CLASSIFICATION PER MINING AREA

Area	Proved			Probable			Total Mineral Reserve		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Open pit									
Incredible	—	—	—	1,410	1.27	57	1,410	1.27	57
Invincible Pit	354	2.63	30	470	3.09	47	824	2.89	77
Neptune	1,026	1.31	43	2,581	2.33	193	3,606	2.04	236
Pistol Club	—	—	—	668	2.55	55	668	2.55	55
Santa Ana	—	—	—	1,596	1.45	74	1,596	1.45	74
Other	7	1.78	0.4	1,923	2.40	148	1,930	2.40	149
Total open-cut	1,387	1.65	73.4	8,649	2.07	575	10,036	2.01	648
Underground									
Hamlet North	—	—	—	970	6.93	216	970	6.93	216
Invincible UG	91	5.72	17	1,414	4.02	183	1,505	4.13	200
Invincible Deeps	—	—	—	1,511	4.38	213	1,511	4.38	213
Invincible South	—	—	—	1,389	6.09	272	1,389	6.09	272
Other	170	4.89	27	73	3.52	8	243	4.48	35
Total underground	261	5.18	43	5,357	5.18	892	5,618	5.18	936
Surface									
Surface stockpiles	3,436	1.42	157	—	—	—	3,436	1.42	157
Grand total	5,084	1.67	274	14,006	3.26	1,467	19,090	2.84	1,741

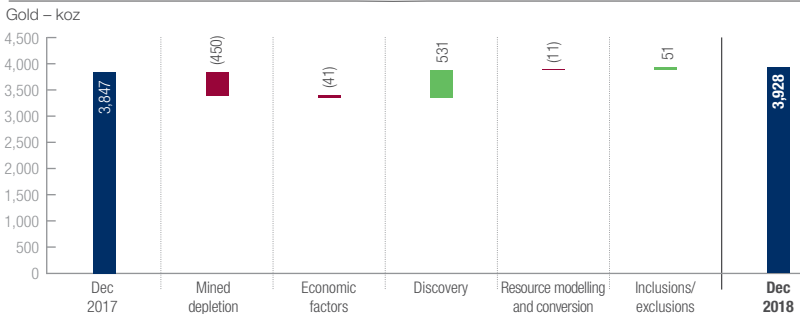
MINERAL RESOURCE AND MINERAL RESERVE RECONCILIATION YEAR ON YEAR

Factors that affected Mineral Resource reconciliation	Factors that affected Mineral Reserve reconciliation
Mining depletion	Mining depletion
Resource model enhancements and discovery at Hamlet North, Invincible UG, Invincible South, Neptune and additional HW/FW lodes in Invincible Pit	Discovery and conversion at Hamlet North, Invincible Deeps, Neptune and Invincible Pit
Higher costs negatively impacted some underground Mineral Resources	

Australia region continued

St Ives gold mine continued

Mineral Resource reconciliation



Mineral Reserve reconciliation

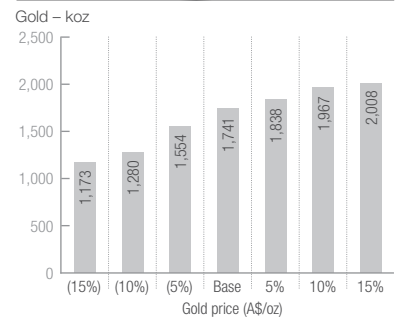


Mineral Reserve sensitivity

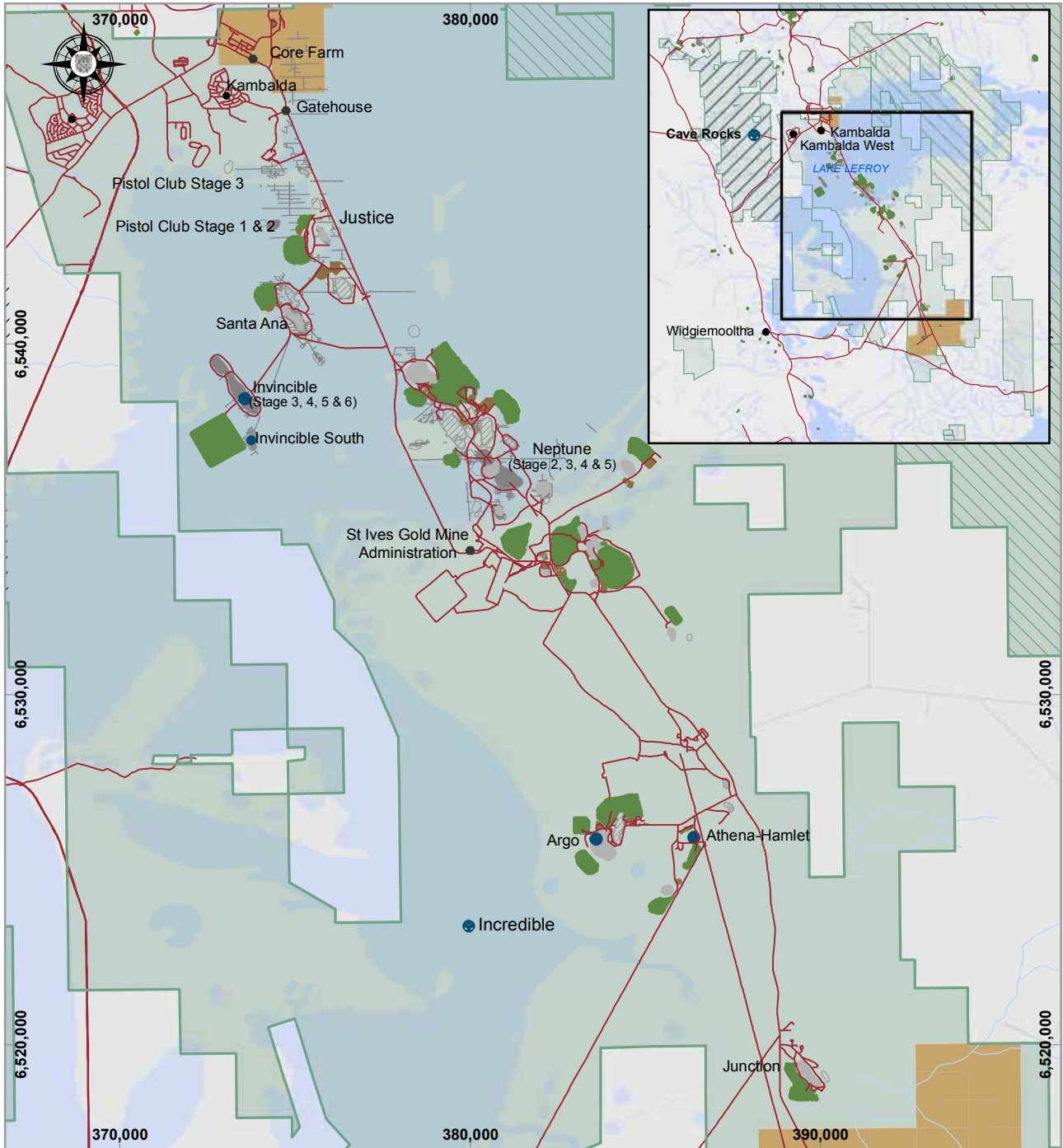
To illustrate the impact of fluctuations in gold price and exchange rates on the current declaration, St Ives has generated sensitivities with respect to Mineral Reserves. The following graph indicates the Managed Mineral Reserve sensitivity at -15%, -10%, -5%, base (reserve gold price - A\$1,600/oz), +5%, +10% and +15% to the gold price.

These sensitivities (other than for the base case) are not supported by detailed plans and depletion schedules. They should only be considered on an indicative basis, specifically as such sensitivities assume 100% selectivity, without any operating cost increases.

Mineral Reserve sensitivity



MINE SITE INFRASTRUCTURE LAYOUT

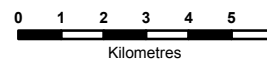


Reference

- | | | | |
|-------------------------------|---|--|---|
| Buildings | ● | Open Pit - Active | ■ |
| UG Mines | ● | Open Pit - Inactive | ■ |
| Significant Deposit | ● | Open Pit - Inactive (Partially Backfilled) | ■ |
| Main Roads | — | Open Pit - Proposed | ■ |
| Lease Outline | ■ | Stockpiles | ■ |
| Lease Outline - Kambalda West | ■ | Tailings Dams | ■ |
| Lease Outline - LEX JV | ■ | Waste Dump | ■ |

**Gold Fields Limited
St Ives Gold Mine**

PLAN SHOWING MINE INFRASTRUCTURE AS AT DECEMBER 2018



Co-ordinate System: Map Grid of Australia Zone 51
(Geocentric Datum of Australia 1994)

Australia region continued

Gruyere project – 50% attributable to GFI



Gold Fields' 50% ownership is held by Gruyere Mining Co (Pty) Ltd and figures will be reported as managed, unless otherwise stated.

A long-life (12 years), low-cost gold project, with construction nearing completion and trial milling due to commence in Q1 2019.

Mineral Resource

3.3Moz gold*

Mineral Reserve

1.9Moz gold*

- The Gruyere project in Western Australia is a 50:50 JV between Gold Road Resources and Gruyere Mining Company (Pty) Ltd, a wholly-owned Australian subsidiary of Gold Fields
- Updated resource modelling in 2018 demonstrated robust geology and stable Reserves from the primary production pit
- First ore production from Gruyere is expected in early 2019 and first gold remains on target for Q2 2019

* The 50% share, attributable to Gold Fields

ASSET FUNDAMENTALS

General location	The Gruyere deposit, centred at latitude 27°59'S and longitude 123°50'E, within the Yamarna Terrane of the eastern Yilgarn, Western Australia. Gruyere is located 200km east of Laverton and 1,000km NE of Perth.
Licence status and holdings	The project, with granted tenements for mining, exploration and miscellaneous of 200,355ha, is located on mining lease M38/1267 granted on 5 May 2016 for a period of 21 years. The mining lease is wholly within the Yamarna Pastoral Lease.
Local geology and deposit type	Gruyere is an Archaean orogenic gold deposit. Mineralisation is hosted within the Gruyere Monzonite Porphyry. Gold is associated with varying intensity albite-sericite-chlorite-biotite-calcite alteration of the host rock.
LoM	Currently the total project indicates a 3.79Moz Mineral Reserve (1.89Moz attributable to GFI), supporting average annual gold production of circa 300,000 (50% attributable to GFI) ounces over a 12-year LoM.
Sustainable development	An external auditor carried out a pre-operational compliance audit of Gruyere and recommended the project for Pre-Occupational Code certification. It is intended to submit the auditor's recommendation to the ICMI by Q1 2019.

Brief history

Gold Road discovered the mineralisation at Gruyere in H2 2013 with interface rotary air blast drilling. A total of 87,066m has been drilled from 470 drill holes on the project (357 RC holes for 41,264m, 73 holes with RC pre-collars for 14,694m, and 16,506m diamond core tail, plus 40 full diamond drill holes (DDH) for 14,603m) were drilled as part of the FS.

A further six diamond drill holes were completed in 2017 to test the down-dip extension below the Gruyere Resource pit and potentially convert unclassified material to Inferred inventory.

The Gruyere project is 50% owned by Gold Fields after forming a JV with Gold Road Resources in November 2016. The JV, comprising more than 200,000ha of miscellaneous, exploration and mining tenements on

both the Dorothy Hills Shear Zone (DHSZ) and Yamarna Shear Zone (YSZ), includes in addition to Gruyere, declared Mineral Resources and Mineral Reserves for Attila and Alaric. In 2018, additional declared Mineral Resources include the Central Bore, Montagne, Orleans and Argos on the YSZ and YAM14 on the DHSZ.

2017/2018 exploration expenditures are presented in the Australia regional section.

Geology

The Gruyere deposit is located on a flexure point of the regional-scale DHSZ within the Dorothy Hills Greenstone Belt, where the shear zone changes from a northerly direction to a NNW direction. Orogenic gold mineralisation is hosted within the steep easterly dipping Gruyere Porphyry, a medium-grained quartz monzonite porphyry that has intruded the country rocks, elongated in the direction of the shear zone. The host Gruyere Porphyry averages 90m in horizontal width through the deposit, with a maximum width of 190m in the centre of the deposit and tapering to around 5m to 10m width at the northern and southern extremities. The entire Gruyere Porphyry is variably altered and gold grade is related to variations in style and intensity of alteration, structure, veining and sulphide species. Zones containing higher grade gold mineralisation (above 1.2g/t gold) generally have strong albite ± sericite ± chlorite ± biotite alteration and are associated with a sulphide assemblage of pyrrhotite + pyrite ± arsenopyrite, weak to moderate foliation, common micro-fracturing and steeply dipping quartz veining.

YAM14 is located 8km south of the Gruyere deposit and similarly is located on a flexure of the DHSZ. Mineralisation at YAM14 is shear related and hosted within an intermediate sedimentary package at the contact with a rhyolitic tuff. Elevated gold grades are associated with shearing, increased quartz veining and albite-chlorite-pyrite-arsenopyrite alteration.

Gold mineralisation within the Attila – Alaric trend (Attila, Alaric, Montagne, Argos and Orleans projects) comprises steeply dipping shear hosted gold in volcanoclastic sequences, with gold associated with zones of albite ± sericite ± chlorite ± pyrite mineralisation.

Central Bore is located approximately 3.7km east of Attila. Local geology at Central Bore consists of sub-vertical dipping andesitic volcanics and porphyritic tuffs with a N-S trend. Gold mineralisation is sub-vertical and restricted to a single, narrow shear zone (~1 – 2m) characterised by carbonate veinlets, alteration and fine-grained sulphides, in particular molybdenite.

Project progress update

An FS was completed on the project in October 2016, which showed a 3.52Moz Mineral Reserve, supporting an average annual gold production of 270koz (50% attributable to Gold Fields) over an LoM of approximately 12 years.

With early works at Gruyere having started in December 2016, construction has now been in progress for more than 24 months. Importantly, the project remains on target to pour maiden gold within the June quarter in 2019. The revised total expected project cost estimate is A\$621M (US\$480M) (level of accuracy range -2% / +2%). Engineering and construction programmes were 97% and 85% complete, respectively, by the end 2018.

In Q1 2018, mining services contractor, Downer EDI Mining (Pty) Ltd (Downer), mobilised a small number of staff to site to begin work on establishing infrastructure facilities, such as workshops to service the mobile mining fleet.

In early November 2018, Downer mobilised a larger contingent to site and commenced mining operations. Mining, with a single excavator and truck fleet, is initially focusing on completing the pre-strip and second stage RoM pad development, with first ore to be mined in the March 2019 quarter. The Gruyere JV expects mining rates to peak at approximately 30Mtpa in 2023 and average 16Mtpa over mine life, utilising a fleet of 225t payload dump

trucks, 400t excavators, production blast hole drills and support equipment. Downer will have a peak workforce of 170 personnel engaged on the project.

Project construction progress in 2018

Gas pipeline

Final approval from the WA Department of Mines, Industry Regulation and Safety for the construction of the 198km Yamarna Gas Pipeline (YGP) was approved in Q4 2017. Construction of the YGP, which was carried out by Nacap Australia (Pty) Ltd on behalf of APA Group; which will own and operate the asset, was completed ahead of schedule during Q2 2018. All generators and gas engines have been installed at the 45MW Gruyere Power Station which has been connected to the YGP. The power station was fully commissioned in Q4 2018.

Bulk earthworks

Bulk earthworks have continued to make good progress, with the contractor completing several key components.

In February 2018, the Gruyere airstrip received Civil Aviation and Safety Authority certification and, to facilitate low-cloud cover and night-time landings, received its Area Navigation certification at the end of April 2018. The airstrip is now classed as an all-weather airstrip that can accommodate jet aircraft carrying up to 100 passengers.

In June 2018, MACA Limited performed the bulk earthworks at Gruyere, completed both the first stage of the RoM pad work and the construction of the TSF embankment walls. Fill material for both projects was derived from pre-strip material sourced from the Gruyere pit.

MACA further completed the TSF construction, focusing on installation and completion of the liner works during Q4 2018, in line with the project schedule.

Australia region continued

Gruyere project continued

Engineering, procurement and construction

The engineering, procurement and construction (EPC) contractor, ACJV continues to deliver plant construction to a high quality, with EPC 81.6% complete as at Q4 2018.

All civil and concrete works for the process plant are complete (approximately 21,500m³ of concrete poured since the start of construction) with structural steel, plate steel and tankage nearing completion. The major equipment and materials required to complete construction are on site. Remaining works on piping, electrical and instrumentation and delivery of plant systems are on track for commissioning, which commences in Q1 2019.

Bore fields

All 32 bores that make up the Yeo bore field, which will serve as the main water source for the Gruyere Process Plant, were completed in 2017. Installation of the 95km water pipeline connecting the bores to the Process Plant was completed in Q4 2018. Flow rate testing on the Yeo water bores shows flow rates in line to slightly above FS estimates.

Limited work to complete the process water supply bore fields and associated pipelines is ongoing. Civil works on the TSF and installation of the tailings decant recovery pipelines have been completed.

Installation of all power poles and 22kV overhead power line by Powerlines Plus was completed slightly ahead of schedule. Electricity to the Yeo bore field was gradually introduced during Q4 2018. Borefield commissioning scheduled to commence early in Q1 2019, aligned with the initial ore processing schedule.

Permitting and environmental

The project proposal underwent formal environmental assessment by the Office of Environmental Protection Authority (OEPA) under Part IV of the Environmental Protection Act 1986 (EP Act).

The Assessment on Proponent Information, Category A (API-A) that was required for the project was prepared. The management and protection of stygofauna (aquatic fauna that live in groundwater systems or aquifers) that have been identified in the Yeo bore field area of the project was the key environmental factor identified by OEPA that required formal impact assessment. Final project EPA Part IV approval was received December 2016. No commonwealth Environmental Assessment was required under the Environment Protection and Biodiversity Conservation Act.

A Project Management Plan, Mining Proposal and Mine Closure Plan detailing information on identification, evaluation and management of environmental impacts relevant to the project and the surrounding environment was submitted to DMP and approval granted in February 2017. In parallel with these proposals, the project received various works approvals and licences for construction and operation of prescribed premises under Part V of the EP Act. These approvals from the Department of Environment Regulation were received in February 2017.

Opportunities for sustainability are being investigated on the back of the Gruyere Central Bore Native Title Agreement which was signed with the Yilka and Cosmo Newberry Aboriginal Community in May 2016. As registered custodians of the

Yamarna area, the Yilka people will realise employment, contracting and training opportunities throughout the life of the project.

Operational readiness

While project construction is underway, the Gruyere JV operational senior management team has been established. The focus of this team is to acquaint themselves with the project details and evaluation, plus review and establish the future operational systems, processes and practices that will enable safe, sustainable and operational efficiencies in a new world-class mine.

Interim early-stage grade control drilling was completed in late 2017 with results returned in Q1 2018. This has provided advanced information on short-scale ore distribution to optimise short-term mining plans. Mining standards and protocols, stockpiling strategies and equipment monitoring plus maintenance software systems are being assessed and evaluated to support operational readiness.

Future staffing, skills and competency assessments, with a recruiting plan for operational start up in early 2019, are underway.

Innovation and technology

Gruyere's current focus is on the following:

- Emphasis on the latest drone technology for a connected mine to allow spatial and volume compliance
- Application of operational controls including Blast Movement Monitors and fragmentation monitoring
- Options for grade bin stockpiling and elevated cut-over grades
- Geotechnical data collection and analysis that may ultimately justify pit wall steepening improvements

Key developments and material issues

- Despite disruptive above average rainfall in February 2018, there was significant progress on constructing and developing the mine including completion of the Gruyere airstrip, main access road, stage 1 pit and early TSF earthworks and commencement of the Yeo bore field
- Emphasis has been on optimising critical engineering, fabrication and field productivity work in H2 2018 to meet the key project milestones, and first gold is on track for Q2 2019
- The 198 Yarmarna Gas Pipeline was completed in June and commissioning of the 45MW gas-fired Gruyere Power Station was completed in Q3 2018, both ahead of schedule
- Grade control (GC) drilling was successfully completed for initial open pit mining and will be continued as a routine part of the mining cycle to improve geological and grade resolution
- The Gruyere JV operations team has developed an execution plan to support the production ramp-up to near name plate capacity. Any delay in the commissioning or ramp-up will have some impact on the 2019 plan
- Projected improvements to the Gruyere LoM average annual production indicates approximately 300kozpa
- Continued exploration activities on the Gruyere JV tenements focused on Resource and Reserve development across the 14km Golden Highway Trend
- The Atilla and Alaric satellite open pit studies aim to support ore delivery in circa 2024
- Infill resource drilling was completed at the Montagne and Argos deposits, resulting in Mineral Resource and PFS updates. These satellite open pits potentially complement the long-life Gruyere mine plan

Mineral Resources

The Mineral Resources and Mineral Reserves for the Gruyere deposit were updated by Gold Fields as at 31 December 2018. The Resource and Reserve for the ancillary Atilla and Alaric deposits have been updated by Gold Road with technical review by GFA. The Resources for Central Bore, YAM14, Montagne and Orleans have been updated by Gold Road with technical review by GFA. Mineral Resources and Mineral Reserves are reported in accordance with the requirements of the relevant reporting codes (SAMREC and JORC covering the JV).

Since assuming operational and management control of the Gruyere JV in January 2017, Gold Fields and the JV management team have initiated further review and technical studies aimed at consolidating and optimising the delivery of the project on time. Project de-risking, contractual agreements and evaluation of additional production and productivity opportunities are ongoing.

MINERAL RESOURCE CLASSIFICATION

The GFI 50% share, as held by Gruyere Mining Co (Pty) Ltd, is reported below.

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit									
Measured	8,365	7,175	7,281	1.18	1.18	1.29	318	272	302
Indicated	49,930	48,856	47,685	1.32	1.29	1.33	2,123	2,030	2,046
Inferred	19,391	19,413	21,855	1.39	1.33	1.36	864	831	959
Total open pit	77,685	75,444	76,822	1.32	1.29	1.34	3,305	3,134	3,307

Australia region continuedGruyere project continued**MINERAL RESOURCE CLASSIFICATION PER MINING AREA**

The total project, as well as the GFI 50% share, as held by Gruyere Mining Co (Pty) Ltd, is reported below.

Area	Measured			Indicated			Inferred			Total Mineral Resource		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Open pits												
Gruyere	16,441	1.17	618	88,529	1.30	3,705	34,590	1.31	1,458	139,560	1.29	5,781
YAM14	—	—	—	227	1.38	10	626	1.15	23	854	1.21	33
Alaric	—	—	—	1,537	1.70	84	841	1.22	33	2,378	1.53	117
Montagne	—	—	—	3,137	1.27	128	75	1.03	2	3,212	1.26	130
Argos	—	—	—	1,191	1.26	48	974	1.13	35	2,165	1.20	84
Orleans	—	—	—	—	—	—	1,006	1.64	53	1,006	1.64	53
Attila	289	1.99	18	5,237	1.61	270	428	1.60	22	5,955	1.62	311
Total open pits	16,730	1.18	637	99,859	1.32	4,246	38,540	1.31	1,627	155,129	1.31	6,510
GFI share	8,365	1.18	318	49,930	1.32	2,123	19,270	1.31	813	77,565	1.31	3,255
Underground												
Central Bore	—	—	—	—	—	—	242	13.05	101	242	13.05	101
Total open pit & underground												
Grand total	16,730	1.18	637	99,859	1.32	4,246	38,781	1.39	1,728	155,371	1.32	6,611
GFI Share	8,365	1.18	318	49,930	1.32	2,123	19,391	1.39	864	77,685	1.32	3,305

Notes:

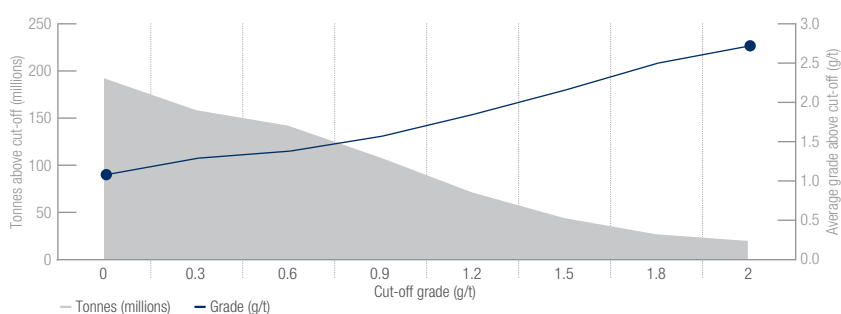
- All Mineral Resources are completed in accordance with the SAMREC Code and JORC Code for Gruyere, Attila, Alaric, Montagne, Orleans, Central Bore, Argos and YAM14)
- All figures are rounded to reflect appropriate levels of confidence. Apparent differences may occur due to rounding
- Mineral Resources are inclusive of Mineral Reserves
- Figures are reported on a 50% attributable basis unless otherwise specified
- All open pit Mineral Resources reported at various cut-off grades. 0.30g/t gold (Gruyere), 0.40g/t gold (YAM14), 0.50g/t gold (Attila, Alaric, Montagne, Argos and Orleans) and constrained within A\$1,850/oz optimised pit shell derived from mining, processing and geotechnical parameters that could be realistically applied to these deposits during future economic extraction. No allowance for an open pit ramp has been included in the geotechnical parameters used to generate the constraining whittle shells. Gruyere ore body is insensitive to minimum mining width constraints
- The only underground Mineral Resource, Central Bore, is reported within economically optimised shapes, applying a gold price A\$1,850/oz, against a cut-off grade of 3.5g/t and minimum mining width of 1.5m

Modifying factors

- All Mineral Reserves are quoted in terms of RoM grades and tonnages, as delivered to the metallurgical processing facilities, and are therefore fully diluted
- The Mineral Reserve statements include only Measured and Indicated Mineral Resources, modified to produce Mineral Reserves that are contained in the LoM plan
- Mineral Resources and Mineral Reserves undergo regular internal and/or external audits, and any issues identified are rectified at the earliest opportunity – usually during current reporting cycle
- The Measured and Indicated Mineral Resources are inclusive of Mineral Reserves

		December		
Units		2018	2017	2016
Mineral Resource parameters				
Mineral Resource Au price	US\$/oz	1,400	1,400	1,275
	A\$/oz	1,850	1,850	1,700
Cut-off for open pit	g/t	0.3 – 0.5	0.34	0.5
Mineral Reserve parameters				
Mineral Reserve Au price	US\$/oz	1,200	1,200	1,125
	A\$/oz	1,600	1,600	1,500
Cut-off for mill feed open pit	g/t	0.3 – 0.7	0.42	0.43
Strip ratio (waste:ore)	ratio	2.80	2.80	2.77
MCF	%	100	100	100
Dilution open pit	%	4.9	4.9	3.2
Plant recovery factor	%	91	91	91
Processing capacity	Mtpa	7.5 – 8.8	7.5	7.5

Grade tonnage curve – 100% of all surface deposits



Australia region continuedGruyere project continued**MINERAL RESERVE CLASSIFICATION**

The GFI 50% share, as held by Gruyere Mining Co (Pty) Ltd, is reported below.

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit									
Proved	8,581	7,616	7,435	1.13	1.11	1.09	311	271	260
Probable	38,541	41,060	38,350	1.28	1.21	1.21	1,584	1,600	1,500
Total open pit	47,122	48,676	45,785	1.25	1.20	1.20	1,894	1,871	1,760

MINERAL RESERVES CLASSIFICATION PER MINING AREA

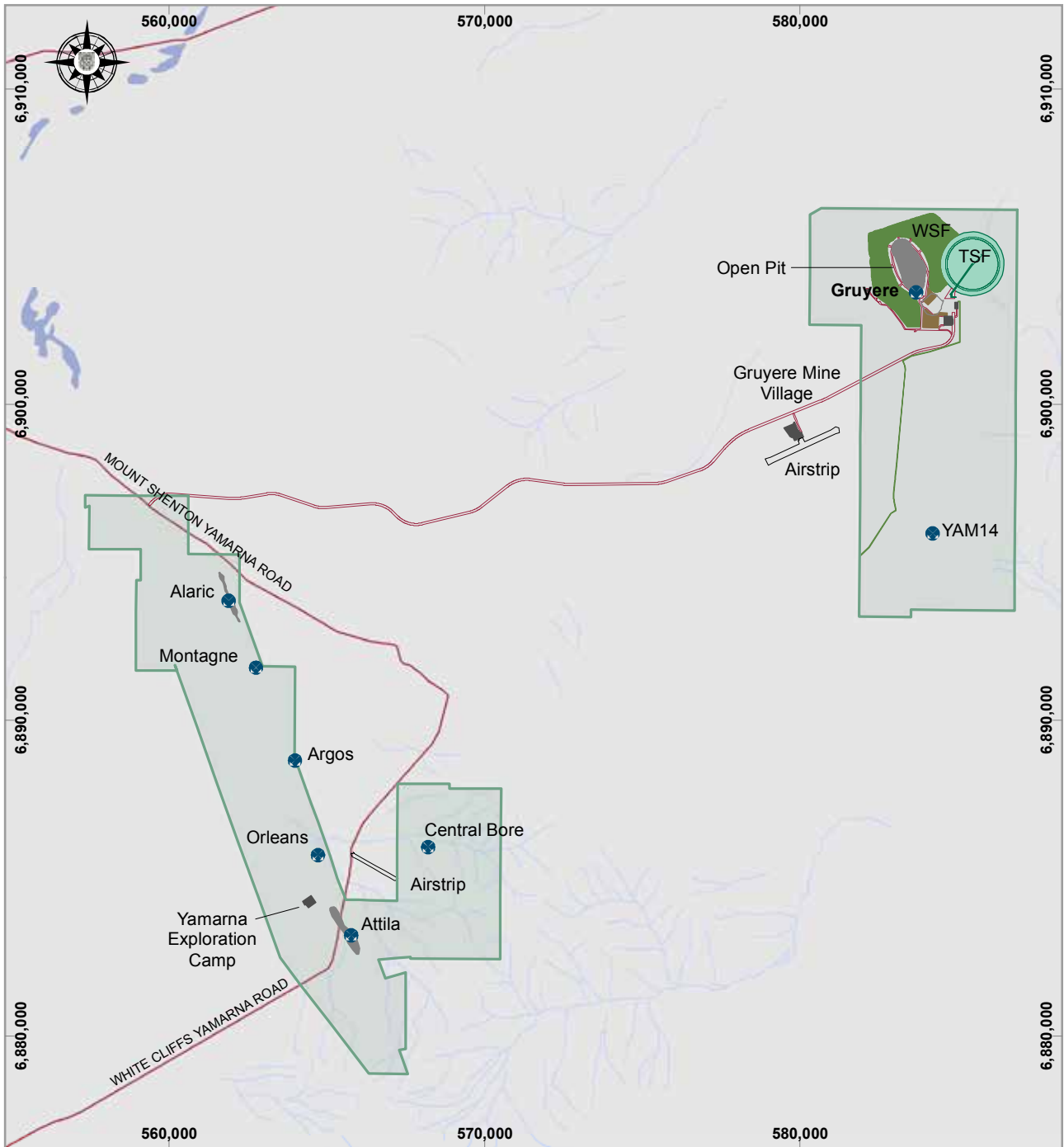
The total project, as well as the GFI 50% share, as held by Gruyere Mining Co (Pty) Ltd, is reported below.

Area	Proved			Probable			Total Mineral Reserve		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Open pits									
Gruyere	16,838	1.11	604	73,815	1.27	3,006	90,653	1.24	3,610
Attila	323	1.68	17	2,889	1.54	143	3,212	1.55	160
Alaric	—	—	—	379	1.50	18	379	1.48	18
Total open pits	17,161	1.13	621	77,082	1.28	3,167	94,244	1.25	3,788
GFI share	8,581	1.13	311	38,541	1.28	1,584	47,122	1.25	1,894

Notes:

- The Mineral Reserve is completed in accordance with the SAMREC and JORC Codes
- Gold Road holds an uncapped 1.5% net smelter return royalty on Gold Fields' share of production from the Gruyere project JV once total gold production exceeds 2Moz
- The Mineral Reserve for the Gruyere deposit is evaluated using a gold price of A\$1,600/oz and is reported above a 0.3g/t grade. Attila is reported above the following variable cut-off grades: 0.70g/t gold (fresh), 0.60g/t gold (transition), 0.55g/t gold (oxide). Alaric is reported above the following variable cut-off grades: 0.67g/t gold (fresh), 0.62g/t gold (transition), 0.57g/t gold (oxide)
- Ore block tonnage dilution averages and gold loss estimates: Gruyere – 4.9% and 0.4%; Attila – 14% and 3%; Alaric – 20% and 6%
- All figures are rounded to reflect appropriate levels of confidence. Apparent differences may occur due to rounding

MINE SITE INFRASTRUCTURE LAYOUT



Reference

- Buildings
- Deposit
- Main/Access Roads
- Lease Outline

- Open Pit
- Stockpiles
- Tailings Dam (TSF)
- Waste Dump (WSF)

-
-
-

Gruyere Mining Company (Pty) Ltd
Gruyere Project Joint Venture Area

PLAN SHOWING PROPOSED INFRASTRUCTURE AS AT DECEMBER 2018



Co-ordinate System: Map Grid of Australia Zone 51
(Geocentric Datum of Australia 1994)

Australia region continued

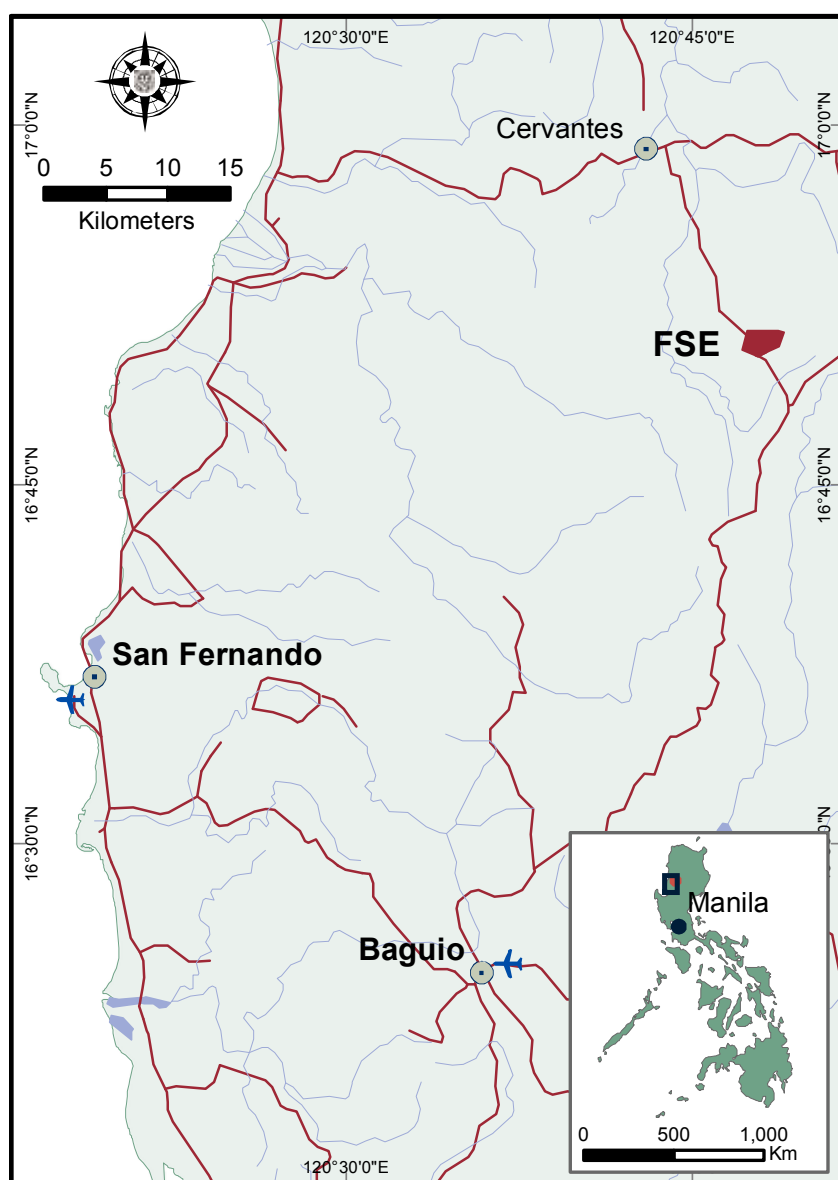


Far Southeast – 40% attributable to GFI

Gold and copper deposit in the Philippines

Mineral Resources of

19.8Moz gold and 9,921Mlb copper



Location

The Far Southeast Project (FSE) is located in the well-known mining district of Mankayan in the Cordillera region of Northern Luzon, approximately 250km north of Manila.

Project ownership and capex

The project is held by Far Southeast Gold Resources Inc. (FSGRI), a JV

company of Lepanto Consolidated Mining Company (LCMC) and Gold Fields. To date, Gold Fields has acquired 40% of FSGRI for payments of US\$230M and has the option to acquire a further 20% by paying an additional US\$110M and incurring initial development costs totalling US\$165M.

Regional geology

The Mankayan district is underlain by a basement of pre-middle Miocene volcanic and intrusive rocks overlain by an extensive cover sequence of Pleistocene dacitic tuffs and breccias, the eruption of which was accompanied by the intrusion of diorite and dacite stocks and domes. Major north-trending strike-slip faults of the Philippine Fault system dominate the structure of the district and have exerted fundamental controls on igneous activity and mineralisation. The district-scale mineralisation is characterised by intermediate sulphidation veins and fault-controlled high-sulphidation enargite-uzonite deposits that have been mined for precious and base metals principally by the Victoria and Lepanto mines. A number of copper-gold porphyry prospects also exist, which principally include the FSE porphyry deposit itself.

Deposit geology

The FSE copper-gold porphyry is a deeply concealed deposit associated with a Pleistocene diorite-dacite intrusion complex intruded into Eocene basaltic country rocks. The intrusion complex is cross-cut by several phreatomagmatic breccia pipes which are pre-, syn- and post-mineralisation. The mineralisation is mostly hosted in the intrusion complex and to a lesser extent the basaltic country rocks and is characterised by disseminated sulphides and multi-phase sulphide-bearing quartz and quartz-anhydrite vein sets and stock works.

No exploration or additional conceptual mine design studies were conducted on the FSE project during 2018 and no further updates have been made to the geology and/or Resources model.

Social licence to operate

For Gold Fields to obtain a further 20% interest in the project, a Financial or Technical Assistance Agreement (FTAA) will be required from the Philippines government. This is dependent on obtaining the free, prior and informed consent (FPIC) of

the local Kankana-ey Indigenous People. In mid-2013, the Kankana-ey Indigenous People voted in favour of the project and a Memorandum of Agreement was signed with the Council of Elders in February 2015. The agreement, together with supporting documentation, is currently being considered by the National Commission on Indigenous Peoples before issuance of a formal certification precondition, which will complete the FPIC process.

In June 2014, LCMC and FSGRI jointly applied for the renewal of Mineral Production Sharing Agreement 001 (MPSA 001), which is the mineral tenement jointly held by the two companies in which most of the FSE deposit occurs. The initial 25-year term of MPSA 001 was due to expire in March 2015.

In February 2015, LCMC and FSGRI commenced arbitration proceedings against the Philippine government regarding whether FPIC is also required for the renewal of the MPSA. In November 2015, the arbitration panel issued an award that FPIC may not be imposed as a requirement for the renewal of MPSA 001 and that the MPSA should be renewed under the same terms and conditions.

In December 2015, the Republic of the Philippines filed a petition to vacate the arbitral award with the court. The court rendered a decision in May 2016 to vacate the arbitral award. After the court denied a motion for reconsideration, LCMC and FSGRI subsequently filed a petition for review with the Court of Appeals in July 2016.

The Court of Appeals ruled in favour of MPSA 001 renewal without need for FPIC in May 2018, and in response the government filed a motion for reconsideration (MR). The MR was denied by the Court of Appeals on 14 January 2019. The government is currently seeking to appeal this decision to the Supreme Court, which is likely to be ongoing during 2019.

Following a review of the country's 40 metallic mines by the Environment and Natural Resources Department in 2016, operations at several mines were suspended due to environmental violations. The Closure Orders on 12 mines, by the former anti-mining Environment Secretary, were reviewed and largely reversed in 2018. Only three Closure Orders were upheld for proven environmental violations. This indicates that the

administrative regulations and processes are working in the project jurisdiction.

The current view and perspective on the Philippines is that matters in the country have not deteriorated relative to 2017, and there were some positive updates in 2018 as outlined above.

Mineral Resources

The historical Inferred Mineral Resource for the FSE deposit, first declared in August 2012, is 891.7Mt at 0.7g/t gold and 0.5% copper for 19.8Moz of gold and 9,921Mlb of copper, has been maintained for the 2018 reporting. The Resource was reported inside a mining constraint, which assumed an eventual non-selective, bulk underground mining method. The classification of Inferred Resource was applied based on drill hole spacing, estimation quality, geological continuity and geological understanding of the deposit in early 2012, supported by a view on reasonable prospects for eventual economic extraction which are viewed as being relevant today. The Inferred Resource has a lower confidence than an Indicated Resource and cannot be converted to a Mineral Reserve.

Resource classification	Tonnes (Mt)	Grade (Au g/t)	Metal (Au Moz)	Grade (Cu %)	Metal (Cu Mlb)
Inferred	891.7	0.7	19.8	0.5	9,921
Total	891.7	0.7	19.8	0.5	9,921

FSE Mineral Resources effective from and unchanged since 31 August 2012

Notes:

- These Mineral Resources are not Mineral Reserves as an assessment to a minimum of a PFS is required
- There has been no further technical work or economic assessments in 2018 to update previous input or commodity prices
- The Mineral Resource is reported in accordance with the SAMREC Code
- The Mineral Resource is reported within an optimised underground bulk mining shell that is derived using scoping study mining, processing and cost parameters, and commodity prices of US\$1,650/oz gold and US\$8,600/t copper. All Inferred Resource material within the shell is reported
- The Mineral Resource is reported without dilution and ore loss parameters
- Rounding-off of figures may result in minor computational discrepancies. Where this happens, it is not deemed significant
- LCMC holds a 60% interest, while Gold Fields holds a 40% interest in the FSE. Attributable metal is 11.9Moz gold and 5,953Mlb copper to Lepanto and 7.9Moz gold and 3,968Mlb copper to Gold Fields

Outlook

The strategic intent for the FSE project is to position it so that it can be advanced subject to technical and economic constraints once the permitting issues are resolved and once the socio-political environment becomes more conducive to mining licence approvals or new mine development. Thus, the project is assisting its JV partner to obtain renewal of MPSA 001 and is completing the process to obtain the FTAA. Community projects, stakeholder engagement, environmental and social baseline data gathering and studies will continue to support the permitting process.



South Africa region

A material restructuring at South Deep was announced in August 2018, aimed at reducing the workforce and mobile equipment levels in alignment with consolidating mining activity to increase focus and to recalibrate the cost base with anticipated levels of production.

The robustness of the Upper Elsburg ore body, coupled to the commitment to a new operating model designed to enable delivery on future planned output, are key elements central to South Deep continuing as a key opportunity to create long-term shareholder value. The thick Upper Elsburg ore body lends itself to mechanised bulk mining methods with the potential to become a safe, low-grade, bulk mechanised and profitable mine.

Strategic imperative

In the wake of the South Deep Rebase Plan not delivering on production and cost targets, the primary objective of the restructuring is to get the mine to breakeven at current levels of production, minimise the cash burn and to drive productivity improvements under the new operating model to bring the mine to profitability.

The mine has experienced a challenging period over recent years, despite multiple interventions to meet its plan and build production volumes to leverage unit costs and become profitable. The mine, in its previous form, was not sustainable, and a transformational organisational change was required to set the mine on a path to value. South Deep is a unique mine unable to rely on industry proxies to inform its strategy and provide benchmarking, and a strategic option evaluation process was conducted in 2018. The intent was to identify the preferred way forward and short circuit and rectify the prevailing issues restricting performance compliance to plan. Subsequent to the assessment of multiple options, the process framed a strategy to reconfigure the operating model, reduce the fixed cost base, drive cash-flow and build the foundation to become a modern, efficient and profitable operation.

SOUTH AFRICA REGION SALIENT POINTS

Mineral Resources

56.2Moz*

(-15% net of depletion)

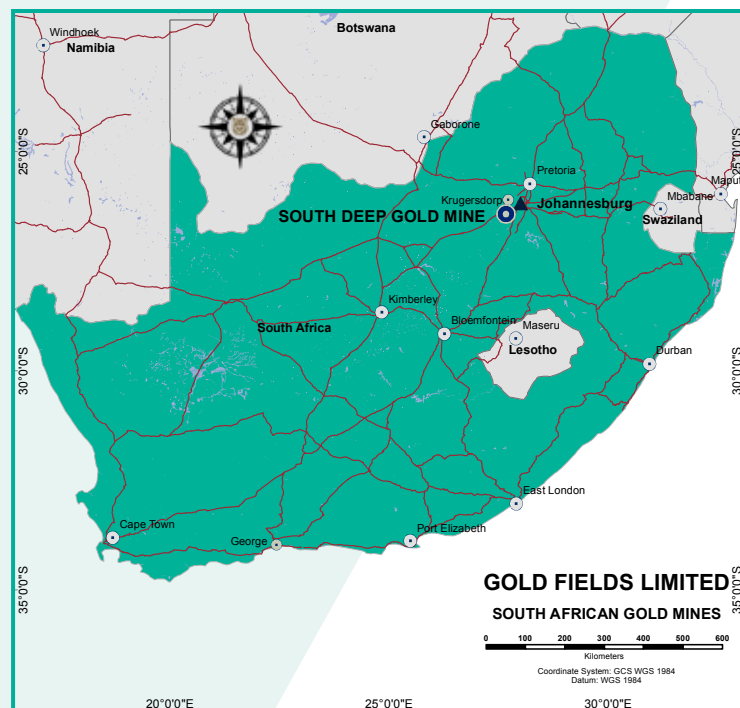
* 90.75% attributable to GFI

Mineral Reserves

32.8Moz*

(-12% net of depletion)

The new life-of-mine (LoM) plan addresses the previous disconnects between mine plan and execution and encompasses the revised strategy and new operating model. It remains anchored by the Rebase Plan design and fundamentals, with a specific renewed focus on improved operational efficiency and execution. The new plan sets out the foundation and installs the key enablers required to fully convert the mine to a fully mechanised bulk-efficient operation with an effective organisational culture supportive of mechanised operations.



The key activities undertaken in 2018 to support implementation of the South Deep revised strategy are listed:

- Fundamental restructuring initiated in Q3 2018, anchored by a new operating model centred on closing loss-making areas and consolidating mining activity to increase focus with a commensurate reduction in the workforce and size of the mobile equipment fleet
- Progress was made on a number of technical and planning fronts:
 - Reduced the mining footprint in marginal areas by suspending Level 87 and largely limiting activity to sustaining services at South Shaft
 - Increased focus on fleet utilisation and reliability to improve overall performance
 - A reduction in capital associated with new mine development and non-critical path infrastructure
 - Significant advancement in the geotechnical programme enhancing ground support protocols and updated mine design and scheduling
 - Implementation of long-hole stoping rig improvements based on increased stope availability and enhanced stope turnaround times
- Implementation of efficiency improvement programmes based on five Business Improvement (BI) initiatives and supporting enabling projects:
 - Enabling visible felt leadership
 - Reinvigorating the leadership system
 - Improving and enhancing the effectiveness of mining face time
 - Facilitating and sustaining key enabling logistics
 - Implementation of Horizon 1 I&T systems

Going forward, emphasis is placed on South Deep showing substantive progress and traction on the mine's core strategic project themes, key performance indicators and enablers in the short to medium term. This is important in establishing the operation's capacity to achieve profitability and deliver the LoM plan steady-state volumes.

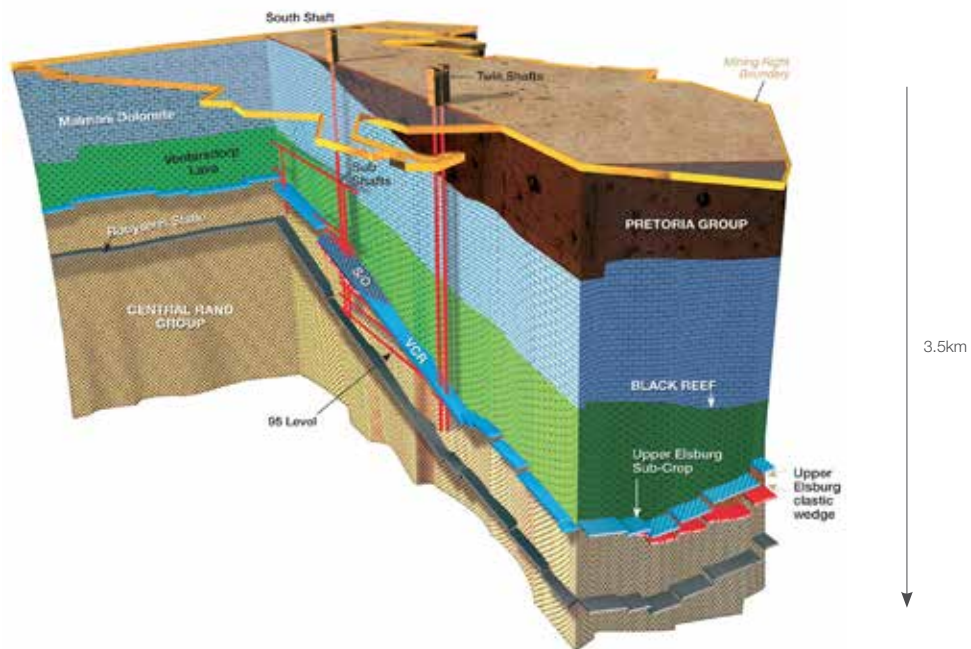
South Africa region continued

Operation

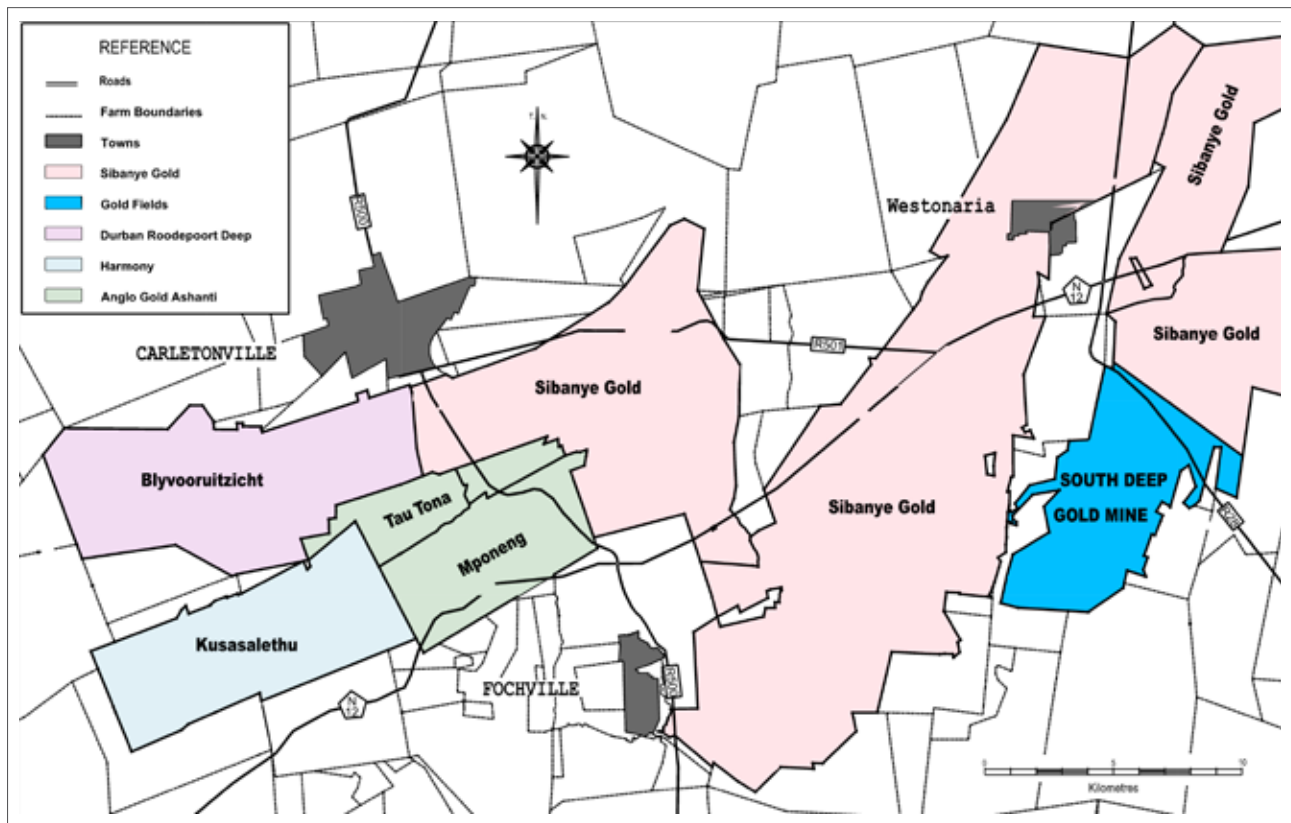
South Deep

Asset fundamentals	
General location	South Deep gold mine is situated in the magisterial districts of Westonaria and Vanderbijlpark (Gauteng province), some 45km SW of Johannesburg at latitude 26° 25'S and longitude 27° 40'E. It is accessed via the N12 provincial road between Johannesburg and Potchefstroom.
Climate	The regional climate is classified as Cwb (warm temperature, winter dry, warm summer) under the Köppen-Geiger climate classification.
Licence status and holdings	South Deep converted its mining right (old order) to new order mining rights in July 2010, as required by the Mineral and Petroleum Resources Development Act 28 of 2002 (as amended). The new order mining rights have been granted in respect of the mining area totalling 4,268ha – including the area known as Uncle Harry's.
Operational infrastructure and mineral processing	<p>The workings are accessed from the surface through two shaft systems, the Twin Shaft Complex (main and ventilation shafts), of which the main shaft comprises a single-drop to 110A level, a depth of 2,998m, the vent shaft to 110 level (2,947m) and the South Shaft Complex, which is a sub vertical system (three operating shafts) to 95 level at a depth of 2,786m.</p> <p>The mine is divided into three main areas:</p> <ol style="list-style-type: none"> 1. Current Mine (CM), characterised by selective mining methods scattered over a large area originally exploited by means of conventional tabular mining. CM is accessed from four active levels (90, 93 and 95) from both the South Shaft and Twin Shaft complexes 2. The North of Wrench (NoW) area, directly south of CM, comprises six mining corridors separated by regional pillars that extend southwards to the Wrench fault. A bulk non-selective mining method is applied here resulting in a higher Resource to Reserve conversion ratio 3. South of Wrench (SoW) East and West, situated south of NoW, which will be mined in the same manner as NoW <p>South Deep gold mine operates one on-property gold plant. The comminution circuit comprises two stage milling with a free gold recovery circuit and gold recovery is carried out using a conventional leach / Carbon in Pulp (CIP) circuit. Final product from both the free gold and CIP circuits is smelted into bullion.</p>
Tailings storage facility	South Deep utilises one TSF known as the Doornpoort TSF. The TSF footprint is designed to accommodate the LoM tonnage after backfill. The first phase of the dam was completed in 2011 and the top of the starter wall has been reached with the first wall raise completed in January 2018. Based on the current LoM plan, the Phase 2 TSF infrastructure expansion will be required in 2020.
Mineralisation characteristics	<ol style="list-style-type: none"> 1. Mineralisation hosted by conglomerates (reefs) 2. Laterally continuous with long-range predictability 3. Clear patterns of predictable mineralisation governed by sedimentary characteristics 4. Ore body definition and resource modelling programmes are ongoing
Local geology and deposit type	<p>The reef horizons exploited in the South Deep LoM include the Ventersdorp Contact Reef (VCR) and the Upper Elsburg formation conglomerates. In the western half of the mining lease area, the VCR occurs as a single reef horizon that overlies footwall lithologies of the Turfontein Subgroup. The Upper Elsburg reefs, sub cropping below the VCR in a NNE trend, comprise multiple stacked reef horizons forming an easterly-divergent clastic wedge as illustrated in the schematic section on the opposite page.</p> <p>This wedge attains a thickness of approximately 120m to 130m in the vicinity of the eastern boundary of the mining right area. The Upper Elsburg Reefs constitute 100% of the South Deep Mineral Reserve ounces, VCR has been excluded from Reserves and contributes only to Mineral Resources in the 2018 reporting.</p>
LoM	It is estimated that the current Mineral Reserves will be depleted in 2093 (75 years).
Sustainable development	<p>South Deep reports its level of compliance in respect of its Social and Labour Plan and Mining Charter commitments, on an annual basis. Furthermore, during Q4 2018, a compliance inspection was conducted by the Department of Mineral Resources (DMR) on the title conditions contained in South Deep's new order mining right.</p> <p>The Department of Water Affairs and Sanitation approved the integrated water use licence lodged in May 2015. South Deep is currently reviewing its water management plan to align with the new licence.</p> <p>A consolidated Environmental Management Plan (EMP), current EMPs were approved in 2010 and 2012, was submitted for approval during Q4 2016, and is still under review by the DMR. During Q1 2018, the mine conducted an external compliance audit of the EMP and improved its score from 96% of 2016 to 98% in 2018. The mine's Safety and Environmental Management Systems are OHSAS18001 and ISO14001: 2015 certified. The mine is certified in compliance with the ICMC.</p>

SCHEMATIC WEST/EAST SECTION THROUGH THE SOUTH DEEP ORE BODY



WEST WITS LINE



South Africa region continued

Regional geology

South Deep is located in the West Rand Goldfield on the NW rim of the Witwatersrand Basin. This basin comprises a 6,000m-thick sequence of predominantly clastic sedimentary rocks, the upper part of which, the Central Rand Group, is characterised by the occurrence of auriferous and uraniferous quartz-pebble conglomerates (reefs) that are sporadically interspersed between finer grained quartzitic units. All major reef units are developed above unconformity surfaces. The angle of unconformity is typically greatest near the basin margin and decreases toward more distal areas. The most fundamental control to the gold distribution remains the association with quartz-pebble conglomerates on intra-basinal unconformities.

The Witwatersrand Basin reefs are considered to represent extensive fluvial deposits into a yoked basin, some 350km long in an ENE direction, and 200km wide in a NNW direction. The reefs are continuous as a consequence of the regional nature of the erosional surfaces. Preferential reef development within channel systems and sedimentary features such as facies variations and channel frequency assist in mapping out local gold distributions. Refer to the asset fundamentals table above for information on local geology and mineralisation style.

Resource definition/mine definition drilling and expenditure

The Mineral Resource base is predominantly classified as Measured and Indicated, with only 6% assigned to the Inferred category. Accordingly, with

the surface exploration programme completed by Gold Fields in 2013 and subsequently incorporated with the results of the 3D vibroseis seismic survey undertaken earlier, drilling is now focused on resource and mine definition as opposed to exploration, which is effectively limited to the long-inclined borehole (LIB) drilling. The current drilling strategy and standard operating procedure aims at profiling the necessary resource confidence level to support and derisk the short, medium and long-term mine design and schedule. To this end, two distinct drilling programmes are employed:

1. Resource definition drilling: provides Mineral Resource information for the medium-term excavation design. This drilling is conducted from footwall infrastructure and is executed in two phases ahead of the advancing destress cut echelon. The first phase is on a 60m to 120m grid, up to 300m ahead of the face. The second phase uses LIBs, attaining a 300m grid, up to 1,000m ahead of the destress echelon. Resource definition drilling provides additional data for structural definition, stratigraphic modelling, facies determination and assaying for grade estimation

2. Mine definition drilling: effectively infill grade control drilling, is the final stage of drilling and data acquisition prior to stoping and provides high-resolution Mineral Resource information for the short-term excavation design. Underground channel sampling is not utilised because of safety, access, logistical constraints and spatial control due to the massive nature of the ore body. The drilling programme is customised to meet the specific needs of the

operation and occurs within the destress cuts and provides the infill drilling to the existing Resource definition drilling to achieve an approximate 30m x 30m grid to support long-hole stoping. The data generated is used for local scale facies determination, structural definition, stratigraphic modelling and assaying for resource estimation. Cover drilling is conducted simultaneously and is a series of low inclined cover holes (-30°) from within the destress cut to enhance detail on geological structure. Up to four holes are drilled per corridor up to a depth of 100m ahead of the advancing cut, and will facilitate a series of geophysical surveys for increased geological confidence and for geotechnical modelling and domaining purposes

On-lease metres drilled and expenditure for the 12-month period ended 31 December 2018 are summarised below.

In accordance with the SAMREC Code, South Deep maintains rigorous quality assurance and quality control (QA/QC) protocols on all its resource definition programmes. It draws on industry-leading practice for data acquisition and utilises accredited laboratories which are regularly reviewed both internally and externally. Analytical QA/QC is maintained and monitored through the submission of blanks, certified reference material and duplicates, plus umpire laboratory checks.

Operation	December 2018			December 2017		
	Metres drilled	ZARM	US\$M	Metres drilled	ZARM	US\$M
Grade control drilling	8,871	19.97	1.51	6,724	20.93	1.69
LIB drilling	1,775	4.44	0.34	2,248	4.46	0.36

Only LIB drilling is classed as exploration drilling



South Deep gold mine

Brief history

1990	Western Areas Gold Mining Company Limited (WA) transferred land and mineral rights to South Deep Exploration Company Limited.
1995	WA and South Deep Exploration Company Limited merged. Sinking of Twin Shaft and access development from South Shaft commenced.
1999	Placer Dome/WA (PDWA) joint venture (JV) was formed, and in 2000 the mine was renamed – South Deep gold mine.
2002	New South Deep gold plant commissioned and the South Shaft plant decommissioned. Sinking of the main shaft was completed and in 2004 the Twin Shaft system was commissioned.
2006/7	Barrick Gold Corporation acquired a majority interest in Placer Dome Inc. Gold Fields acquired Barricks' 50% JV interest in the PDWA JV and, in 2007, Gold Fields acquired all remaining WA shares and consequently own 100% of South Deep gold mine.
2008/9	Stopped all conventional mining, and low-profile mechanised destress mining started in 2009.
2010	New-order mining right granted, with the addition of the contiguous area known as Uncle Harry's.
2011	Establishment of Newshelf 899 (Pty) Ltd (Newshelf), which holds a 100% interest in South Deep gold mine. Newshelf is a 90% subsidiary of Gold Fields and the remaining 10% is held by outside shareholders as part of the black economic empowerment transaction.
2017	High-profile destress method successfully implemented. Rebase plan initiated.
2018	Major restructuring initiated in support of a new operating model designed to improve operational efficiency, reduce operating costs and leverage cash-flow.

Operations

2018 was a challenging year for South Deep, marked by strategic restructuring and associated industrial action. However, the required changes to management and labour complements were successfully completed by year end. In addition, in 2018, extensive ground support rehabilitation in the ramp accesses was required to secure long-term stability of the mine's main egresses. Difficulties were also realised in stoping areas destressed using previous methods (transition areas), causing delays with backfill, access stability, destress performance and extraction losses. These issues had a material impact on the mine being unable to deliver its 2018 production targets.

During the year improvements in the core areas of operating philosophy, values-based culture, processes and

systems were progressed in support of the new operating model.

Re-invigorating our leadership system:

- Productivity improvement programme in progress
- Asset maintenance improvement project in progress
- Redesigned organisational structures:
 - Clearly differentiated levels of work
 - Single point of accountability
- Reinforce proactive planned maintenance culture

Processes:

- Production engineering improvements in drill and blast quality and mining technique
- Stope turnaround:
 - Reduced the stope sizes and remodelled hydraulic radius to improve stope turnaround

- Enhanced secondary rock breaking process
- Improved stope cleaning practices by modifying the incentive scheme and driving the right culture
- Simplified shift configuration to improve available face-time
- Mechanisation:
 - Implemented centralised blasting
 - Mechanisation of long-hole stope charging
- Acquisition and re-commissioning of dedicated mechanised support equipment (roof and cable bolters)

Systems:

- Equipment efficiencies:
 - Reducing and rationalising fleet size
 - Mining rates adjusted for mining complexity
- Support:
 - Simplified support standards to assist mechanised installation

South Africa region continued

South Deep gold mine continued

- Implemented improved support design (shotcrete for pillar retention)
- Implemented backlog support schedule and tracking system
- Backfill process improvement:
 - Backfill system gap analyses and piping improvement project
 - Stope additives to mitigate leakages
 - Backfill backlog tracking and scheduling system
- Planning:
 - Integrated activity-based mine plans
 - Acquiring SAP PM for maintenance planning
 - Integrating maintenance planning and short-term mine scheduling

The above BI programmes are all embedded in the new operating model's architecture and are designed to have a positive impact on enabling this year's production and cost performance, and underpin the production ramp-up and Mineral Reserve.

Key developments and material issues

Reconciliation

- The 4.6Moz decrease, post depletion, in the Mineral Reserve (-12%) is the result of applying the following LoM factors:
 - -2.4Moz resulting from incrementally higher cut-off grades due primarily to the impact of lower throughput tonnages and the new strategy and operating model
 - -1.8Moz due to the application of loss factors to NoW and SoW from 2023 to account for geological faulting anticipated, based on current experience, but not defined by drilling
 - -0.94Moz from increased loss factors from stoping to better align with current performance trends; will be recalibrated annually as improvements are sustained
 - -0.14Moz removed from Reserve designs in response to prevailing conditions in CM and NoW up to 2022 (e.g. bracket pillars, holings into historical excavations and pillar deterioration)
 - -0.35Moz from exclusion of the VCR ore body pending definition of a suitable mechanised mining method
 - +1.2Moz due to LoM tail-end optimisation

Geotechnical and mine design

- As an ultra-deep bulk mine, geotechnical considerations and mine design are critical elements in the overall successful extraction of the ore body. South Deep has converted from a 2.2m low profile (LP) destress mining method to a high profile (5.5m) layout over the past three years. This has eliminated an inefficient and cumbersome multi-step mining process and has enabled a change to mechanised roof bolt installation

- Changes to the regional pillar design have been implemented to reduce the corridor span from 240m to 180m between the regional pillars, increasing the number of corridors from four to six. This change is enhanced by increasing the dimensions of crush pillars in the destress cuts from 1.5m to initially 6m x 10m and subsequently to 8m x 20m yield pillars, to reduce closure and energy release rates
- The mining taking place in the transitional LP to HP crush pillar (6m pillar) to HP rib-pillar (8m pillar) areas is problematic due to legacy sub-optimal conditions associated with the previous mine design and poor mining practices. To improve the production ramp-up in the long-term plan, South Deep aims to reduce output from these CM areas while proportionally increasing production from the NoW area which is based on the improved and significantly more efficient long-term mine and pillar design
- Maintaining the required resistance to control closure on the destress pillars has been a challenge and despite adjustments, continual support rehabilitation has been needed. In response, the support design was significantly upgraded in 2018 to provide improved resistance for the pillars, with shotcrete now applied and anchors increased from 4.5m to 6.5m long, significantly stiffening the pillar system
- South Deep has increased its installed capacity to backfill and is transitioning from classified tailings backfill to full plant tailings, which will improve the capacity and ability to tight backfill the mined-out voids. The mine has refined the way in which it barricades the voids to better cope with the large volumes of backfill used and addressing the backfill backlog continues to be a focus in 2019

Modifying factors and mine plan assumptions

A critical evaluation of the mine's historic and current performance, in conjunction with an assessment of the timing for the new operating model to achieve full impact, facilitated a review and recalibration of a number of key plan inputs for the December 2018 LoM plan. This process resulted in:

- Increased breakeven cut-off grade
- Increased stope ore loss assumptions
- Increased geological loss factors
- Exclusion of the narrow reef VCR from the Reserve
- Reduced mining extraction ratio from transition areas in CM
- Exclusion of high risk Resource ounces in CM remnant mining areas

Mine plan execution

Based on the restructuring and new operating model, delivery on the 2019 operation plan objective is essential to establishing whether the operation has the capacity to become profitable in the short to medium term.

A key challenge facing South Deep is the timely and effective execution of the various integrated components of the plan that need to be delivered to underpin the current Mineral Reserve. Realisation of the planned production and cost performance in the future will not be feasible without the planned efficiency improvements to production cycle time, especially in the application of shotcrete and the placement of backfill. Realising a material improvement in organised labour engagement at the mine

(post the restructuring) is also an important factor. In addition, key enablers to facilitate plan execution include:

- Enhancement of front-line supervision and leadership
- Improved organisational design
- Rigorous performance management
- Improved stakeholder engagement
- Reliable fixed infrastructure (shafts, ramps, haulages, roads, rail, tips, ore passes, ventilation and cooling, power, water, stores, main and satellite workshops)
- Improved fleet availability and utilisation
- Improved drill and blast to improve cavity design, reduce over-break and under-break

To this end, the emphasis has now moved from designing and confirming outstanding technical parameters to focusing on implementation and operational execution. Full integration of the production engineering department with short-term interval control is a key catalyst to driving improved drill and blast and stoping compliance. A comprehensive execution programme is now in place driving the prioritised implementation of all the key BI enablers and I&T elements needed to support plan delivery. This programme will be monitored by a performance scorecard, incorporating both leading and lagging indicators that will be vital to tracking performance and highlighting areas that may warrant review and reassessment as part of this year's business planning cycle.

New Mining Charter

A new Mining Charter was published by the DMR in mid-2018, but the renewal of licences remains a critical issue for industry. The Minerals Council of South Africa won a court case recognising the 'once empowered, always empowered' principle, which would guarantee the legislated black economic empowerment ownership levels for South Deep until its licence renewal in 2040 and a further term of 30 years after that. However, the ruling has been appealed by the DMR.

Cooke 4 mine partial closure

In 2016, Sibanye-Stillwater announced the partial closure of its Cooke 4 mine and submitted a final assessment report to the regulator in October 2017. South Deep is an interested and affected party in the process, as there may be a number of potentially adverse impacts on the mine should pumping of mine water cease at Cooke 4, if Sibanye were to receive the required approvals. South Deep, which is against the cessation of pumping, has opposed this application. In Q3 2018, the Regulator issued a negative environmental authorisation to Sibanye-Stillwater (i.e. declined their application to cease pumping), which authorisation was taken on appeal by them. South Deep opposed this application and is currently awaiting an outcome. However, South Deep is continuing to engage with Sibanye-Stillwater and other stakeholders to find an appropriate and effective solution and has appointed consulting engineers to develop alternative pump-and-treat options to keep Cooke 4 dewatered.

South Africa region continued

South Deep gold mine continued

Operating statistics

	Units	Historic performance		
		Dec 2018	Dec 2017	Dec 2016
Development				
Total development	m	5,047	6,897	6,933
– Waste development	m	2,572	2,854	1,405
– Reef development	m	2,475	4,043	5,528
Underground mining (including) development)				
Total distress mined	m ²	18,793	33,419	32,333
Total mined	kt	1,036	1,610	1,722
– Waste mined	kt	200	189	111
– Ore mined	kt	835	1,421	1,611
Mined grade (ore only)	g/t	6.0	5.9	5.6
Mined grade (ore and waste)	g/t	4.9	5.2	5.3
Au broken	kg	5,048	8,365	9,063
Processing				
TSF mining	kt	282	433	507
TSF value	g/t	0.2	0.2	0.2
Waste treated	kt	210	165	107
Underground ore treated	kt	828	1,482	1,634
Total tonnes treated	kt	1,320	2,081	2,249
Underground ore yield	g/t	5.9	5.3	5.2
Head grade (combined) ¹	g/t	3.9	4.4	4.2
Yield (combined)	g/t	3.8	4.2	4.0
Plant recovery factor (underground)	%	96.3	96.5	96.5
Plant recovery factor (surface)	%	59	46	46
Total Au production	kg	5,220	8,748	9,032
Au sold	koz	167.8	281.8	289.0
Financials				
Au price received	US\$/oz	1,252	1,256	1,238
	ZAR/kg	531,253	538,344	584,894
Exchange rate (annual average)	ZAR:US\$	13.20	13.33	14.70
Cost of sales before amortisation and depreciation	RM	2,564	4,062	3,993
	ZAR/kg	491,188	464,335	442,095
Capital expenditure (capex)	RM	770	1,099	1,144
	ZAR/kg	147,510	125,629	126,705
	US\$/oz	348	291	268
All-in costs (AIC)	ZAR/kg	854,049	600,109	583,059
	US\$/oz	2,012	1,400	1,234
All-in sustaining costs (AISC)	ZAR/kg	807,668	574,406	570,303
	US\$/oz	1,903	1,340	1,207
LoM				
Mineral Reserves	Mt	182.3	216.8	217.6
Mineral Reserves head grade	g/t	5.6	5.4	5.3
Mineral Reserves	Moz	32.8	37.4	37.3

¹ Includes TSF and underground waste development

Rounding off of figures presented in this report may result in minor computational discrepancies. Where this occurs, it is not deemed significant.

Mining

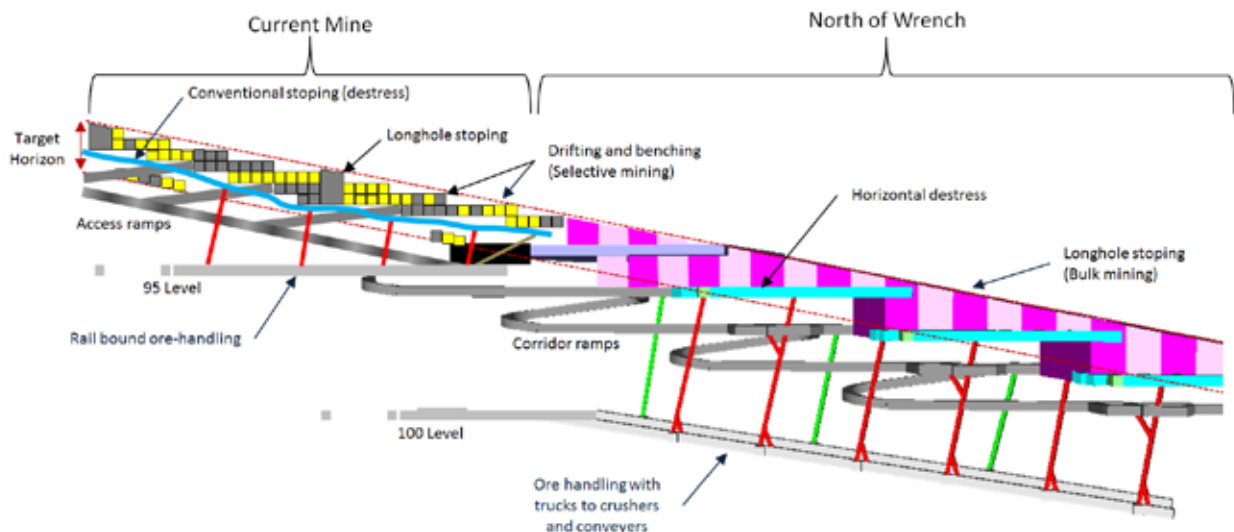
Mining methods

Current production is sourced from two primary mining areas, CM and NoW. CM is characterised by selective mining methods scattered over a large area, whereas the NoW area focuses on six corridors migrating southwards with bulk non-selective mining methods.

The CM area is defined by the previous conventionally mined zones that serve as destress for mechanised massive mining above and below these horizons in the remaining Elsburg reefs. Mining activities are largely scattered over the whole of the CM area. These areas are accessed with normal development from existing ramps and extracted with drifts, benches and long-hole stopes. Due to the nature of mining here and the risks associated with mining between other old excavations, the Resource to Reserve conversion is generally low. However, feasible mining and extraction methods have the potential to mine these areas, and will be further assessed and developed, where appropriate.

The NoW area is largely unmined, and an improved mining method is applied here which is designed for the efficient extraction of the thick ore body without being impacted by historical excavations, backfilled areas or old pillars. Applying an optimal bulk extraction method here maximises the gold ounce extraction and reduces mining complexity. Owing to South Deep's depth, a destress cut is required to lower the in situ stress, such that mechanised bulk mining can be conducted. This cut also serves as access for bulk long-hole stoping. The 5.5m high destress cut is mined horizontally into the ore body with mechanised equipment similar to a room and pillar layout. From the destress cut, a long-hole stoping method is applied to extract the remainder of the Elsburg reefs to the cut above or the limit of the target zone. Thinner target areas for stoping above and below the destress cuts are mined with drifts and benches similar to CM. The combination of these methods, applied in NoW, significantly improves the Resource to Reserve conversion rate and forms the basis of South Deep's future. All stoping areas are backfilled after completion to increase geotechnical stability of the surrounding rock mass.

SECTION ALONG THE DIP OF THE REEF



Section along the dip of the reef highlighting mine design for CM and NoW

South Africa region continued

South Deep gold mine continued

Mine planning and scheduling

Geotechnical consideration and interdependent activity cycles dictate the sequence and geometry in which South Deep can advance its mining activities. Detailed planning and sequencing of the combined development and distress access work is required prior to commencing stoping. These critical path activities are resourced and scheduled to ensure that sufficient stoping areas are made available at the right time, with a level of flexibility to support the production build-up programme.

Mining equipment rates and activity efficiency estimates have been adjusted to align with current performance trends. Improvements in efficiency over time are based on design enhancements and enablers that include:

- Dual access to the working faces allowing for a smoother flow of equipment and improved fleet logistics

- Satellite workshops on every cut to improve fleet maintenance, reliability and performance
- Additional ore-passes per cut that will remove dump trucks from the stoping horizon

South Deep's LoM plan incorporates a transition from the CM to the NoW area as the LoM plan progresses towards steady state. CM ramps down in its contribution to the production profile over the next 10 years commensurately with NoW ramping up to provide the volume uplift to reach steady-state production levels. CM is characterised by selective mining methods scattered over a large area with abundant legacy mining constraints, whereas the NoW area focuses on six corridors migrating southwards with more efficient bulk non-selective mining methods. The fundamental difference in mine design, stope sequencing and selectivity between CM and NoW/SoW is highlighted by the contrast in the Resource to Reserve conversion, which

is approximately 33% vs 70 – 80% respectively.

The SoW West area starts to contribute to gold production by approximately 2028 and SoW East by around 2037. As a result, the targeted technical and financial metrics for the mine will be fully embedded as the mining centre of gravity migrates to the NoW and subsequently SoW areas.

The revised strategy and new operating model described above is engrained in this LoM plan, which will continue to be updated and recalibrated as more empirical operational data is gathered under the new operating model. This will ensure that the annual LoM process incorporates the latest performance trends, production rates and cost parameters. The effectiveness of the mining method is dependent on adherence to standards, scheduling and implementation of all critical enablers.

UNDERGROUND WORKSHOP AT SOUTH DEEP GOLD MINE



Innovation and technology (I&T)

South Deep's focus on I&T technical solutions to drive safety and productivity include:

- Increased fibre capacity and wireless coverage on the data network backbone underground
- Live mobile equipment and fixed infrastructure monitoring deployment and the establishment of a surface central control centre
- Automation of selected activities, mainly in drilling, hauling and supporting activities
- Tele-remote operations for rock-breaking operation and non-line-of-sight tele-remote loaders
- Integration of data systems (mine technical systems and financial systems) to provide holistic views of the operation and improved work flows

Mineral Resources and Mineral Reserves

The Mineral Resources and Mineral Reserves were updated as at December 2018 and used a gold price of US\$1,400/oz (R600,000/kg) and US\$1,200/oz (R525,000/kg),

respectively, and reported in accordance with the SAMREC Code. The December 2018 Mineral Resources have been stated inclusive of Mineral Reserves. Geological and Resource evaluation models have been updated to reflect the latest

available data sets. All Mineral Resources and Mineral Reserves are classified as being above infrastructure, in line with international practice where Reserves are accessed via ongoing ramps which are incorporated in the LoM.

Mineral Resources

As at December 2018, the total Mineral Resource estimate at the South Deep gold mine is as follows:

MINERAL RESOURCE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Underground									
Measured	20,201	35,774	41,212	7.04	6.65	6.39	4,570	7,653	8,464
Indicated	221,840	259,821	203,105	6.31	6.07	7.10	44,981	50,725	46,335
Inferred	20,966	29,167	31,549	9.13	8.02	7.62	6,152	7,520	7,728
Total underground	263,007	324,762	275,866	6.59	6.31	7.05	55,703	65,898	62,527
Surface stockpiles									
TSF (Measured)	65,020	56,808	64,139	0.21	0.23	0.22	449	421	444
Surface Stockpiles									
Grand total	328,027	381,570	340,005	5.32	5.41	5.76	56,152	66,318	62,971

MINERAL RESOURCE CLASSIFICATION PER MINING AREA (EXCLUDING STOCKPILES)

Area	Measured			Indicated			Inferred			Total Mineral Resource		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Underground												
Current Mine	13,297	6.20	2,652	7,463	6.17	1,482	—	—	—	20,760	6.19	4,134
NoW	6,117	7.51	1,476	45,091	6.73	9,756	—	—	—	51,208	6.82	11,233
SoW-E	—	—	—	58,292	6.06	11,351	1,825	5.41	317	60,118	6.04	11,669
SoW-W	—	—	—	106,238	6.07	20,724	9,037	7.34	2,132	115,275	6.17	22,856
VCR	787	17.45	441	4,756	10.91	1,668	10,104	11.40	3,702	15,646	11.55	5,811
Total underground	20,201	7.04	4,570	221,840	6.31	44,981	20,966	9.13	6,152	263,007	6.59	55,703

The Mineral Resource reporting protocol involves reporting the Resource on a minimum mining width with a generic minimum Resource block dimension of 5m x 5m x 5m, which is reflective of the excavation types and mining methods employed in the LoM plan. It provides a practical block model geometry and GTCs better aligned to the current mining method

The Resources for CM, NoW and SoW all accommodate the latest mine design shapes (inclusive of the in-design material) and include the additional tonnes at a lower average grade that will be sourced from these areas

South Africa region continued

South Deep gold mine continued

Modifying factors

- Unless otherwise stated, all Mineral Resources are quoted as 100% and are not attributable with respect to ownership
- The Measured and Indicated Mineral Resources are inclusive of Mineral Reserves
- Regional pillars are excluded from the Mineral Resource
- The Mineral Reserve statement includes only Measured and

Indicated Mineral Resources, modified to produce Mineral Reserves and contained within the LoM plan

- Mineral Resources and Mineral Reserves undergo regular internal and/or external audits, and any issues identified are rectified at the earliest opportunity – usually during the current reporting cycle
- All Mineral Reserves are quoted in terms of run-of-mine grades and

tonnage as delivered to the metallurgical processing facilities inclusive of in-section waste tonnes, but exclusive of capital development waste material

- All reserved excavation designs are generated in full 3D virtual space
- Modifying factors are applied to the design to account for dilution and mining losses

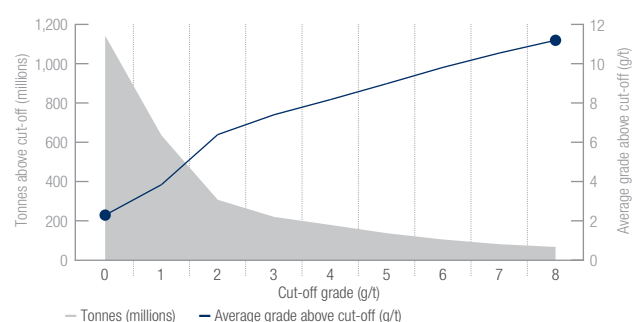
	Units	Dec 2018	Dec 2017	Dec 2016
Mineral Resource parameters				
Mineral Resource Au price	US\$/oz	1,400	1,400	1,400
	ZAR/kg	600,000	600,000	650,000
Cut-off grade ¹	g/t	3.7 – 4.1	3.4 – 3.8	3.2 – 3.6
Mineral Reserve parameters				
Mineral Reserve Au price	US\$/oz	1,200	1,200	1,200
	ZAR/kg	525,000	525,000	550,000
Cut-off grade (NoW – SoW)	g/t	4.1 – 4.5	3.9 – 4.2	3.8 – 4.2
Mine Call Factor (MCF)	%	100	100	100
Dilution underground	%	11.1	8.8	7.9
Losses underground	%	17	8	5.5
Plant recovery factor	%	96.5	96.5	96.5
Processing capacity	Mt/pta	4.0	4.0	4.0

¹ Elsburg reefs only, VCR COG = 3.7 – 6.0 g/t

GRADE TONNAGE CURVE

Grade tonnage curve for the total underground Mineral Resource is presented below.

Grade tonnage curve – Underground



Note

¹ Reserve material profiled as 'in-design' material added to the resource footprint has not been accounted for by the MSO-generated stopes and is consequently excluded in the grade tonnage curve

Mineral Reserves

The 2018 Mineral Reserve estimate is based on the LoM plan and classified according to the SAMREC Code and subdivided into Proved and Probable Reserve.

The LoM design and scheduling work is undertaken by experienced engineers using appropriate mine planning software. The planning

process incorporates realistic modifying factors and the use of appropriate cut-off grades, geotechnical criteria, mining fleet productivities, stope performance metrics, interdependent mining activities and other techno-economic investigations. Capital requirements are accommodated in the cash-flow model to ensure sustainable operations over the LoM.

The broad-based black economic empowerment transaction, concluded in December 2010, grants an empowerment consortium ~10% of South Deep's total Reserves. Based on the relevant sliding scale of the vesting of the economic benefit attached to the 10% and the current LoM profile, the Mineral Reserve portion currently attributable to Gold Fields is 90.075%.

MINERAL RESERVE CLASSIFICATION

	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Underground									
Proved	11,811	13,974	15,099	6.05	5.82	5.59	2,296	2,617	2,716
Probable	170,446	202,787	202,499	5.57	5.33	5.32	30,512	34,771	34,609
Grand total	182,258	216,761	217,598	5.60	5.36	5.34	32,808	37,388	37,324

MINERAL RESERVE CLASSIFICATION PER MINING AREA

Area	Proved			Probable			Total Mineral Reserve		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Underground									
Current Mine	5,260	5.76	974	2,807	4.37	394	8,067	5.28	1,369
NoW	6,551	6.28	1,322	34,659	6.03	6,719	41,210	6.07	8,041
SoW – E	—	—	—	45,911	5.39	7,952	45,911	5.39	7,952
SoW – W	—	—	—	87,069	5.52	15,447	87,069	5.52	15,447
VCR	—	—	—	—	—	—	—	—	—
Total underground	11,811	6.05	2,296	170,446	5.57	30,512	182,258	5.60	32,808

Mineral Reserves at South Deep are reported at mill head grade inclusive of ore and in-section (in-design) development tonnes, which cannot be separated in the ore flow. The capital waste is excluded due to future separation potential in the ore flow NoW. If included in the ore flow for the LoM, the impact on the Mineral Reserve grade would be -0.2 g/t with the related volume increase

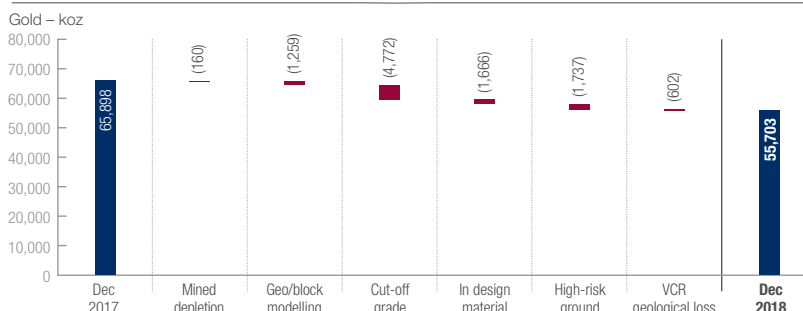
South Africa region continued

South Deep gold mine continued

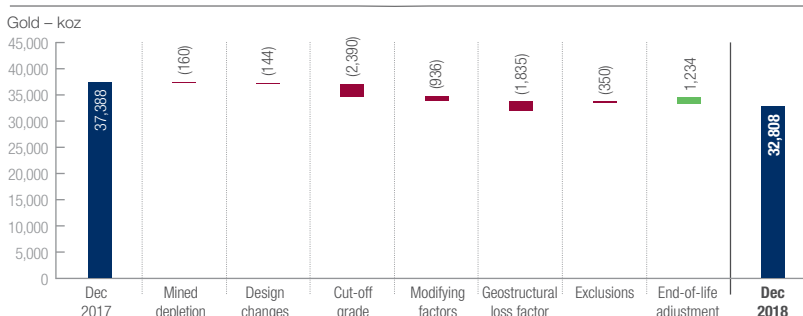
MINERAL RESOURCE AND MINERAL RESERVE RECONCILIATION YEAR ON YEAR

Factors that affected the Mineral Resource reconciliation	Factors that affected the Mineral Reserve reconciliation
Production depletion (160koz)	Production depletion (160 koz)
Geological modelling updates and sub-crop extension to the west, due to additional borehole and mapping data.	Annual updates to the Mineral Resource block model
Increase in cut-off grade (3.4 to 3.7g/t for CM and NoW) In-design material – The Mineral Resource is annually updated with the new mining target envelope based on updated cut-off grades and geotechnical factors. Gold-bearing access development in the form of de-stress and stope accesses below the cut-off grade, and outside of the Resource envelope is additionally included in the Resource estimate as "In design material". The in design material reduced year on year, due to the reduced Reserve envelope and commensurate development footprint. Higher risk geotechnical areas excluded from CM Resource estimate due to low probability of extraction Applied a 10% geological loss factor to the VCR	Increase in cut-off grade (3.8 to 4.1g/t for CM and NoW) – impact of lower overall LoM throughput tonnages and new operating model New mine designs in response to prevailing geotechnical conditions in CM and NoW area up to 2022 (e.g. bracket pillars, holings into historical excavations and pillar deterioration etc.) – applied as a 5.5% factor beyond 2022 Increased loss factors in stoping aligned to actual performance trends. New geostructural loss factor applied to accommodate mining losses related to undefined geological structures
	Strategic exclusion of the VCR narrow reef mining, pending completion of a suitable mechanised mining method End-of-life adjustment: Reduced breakeven volume and sequencing optimisation increased circa 1.2Moz

Mineral Resource reconciliation – Underground only



Mineral Reserve reconciliation



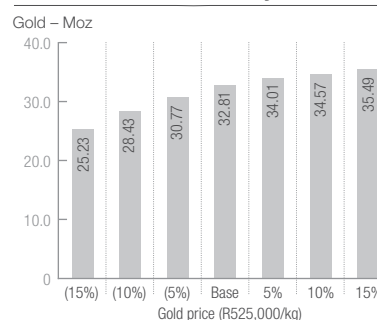
Waterfall graphs represent underground material only

Mineral Reserve sensitivity

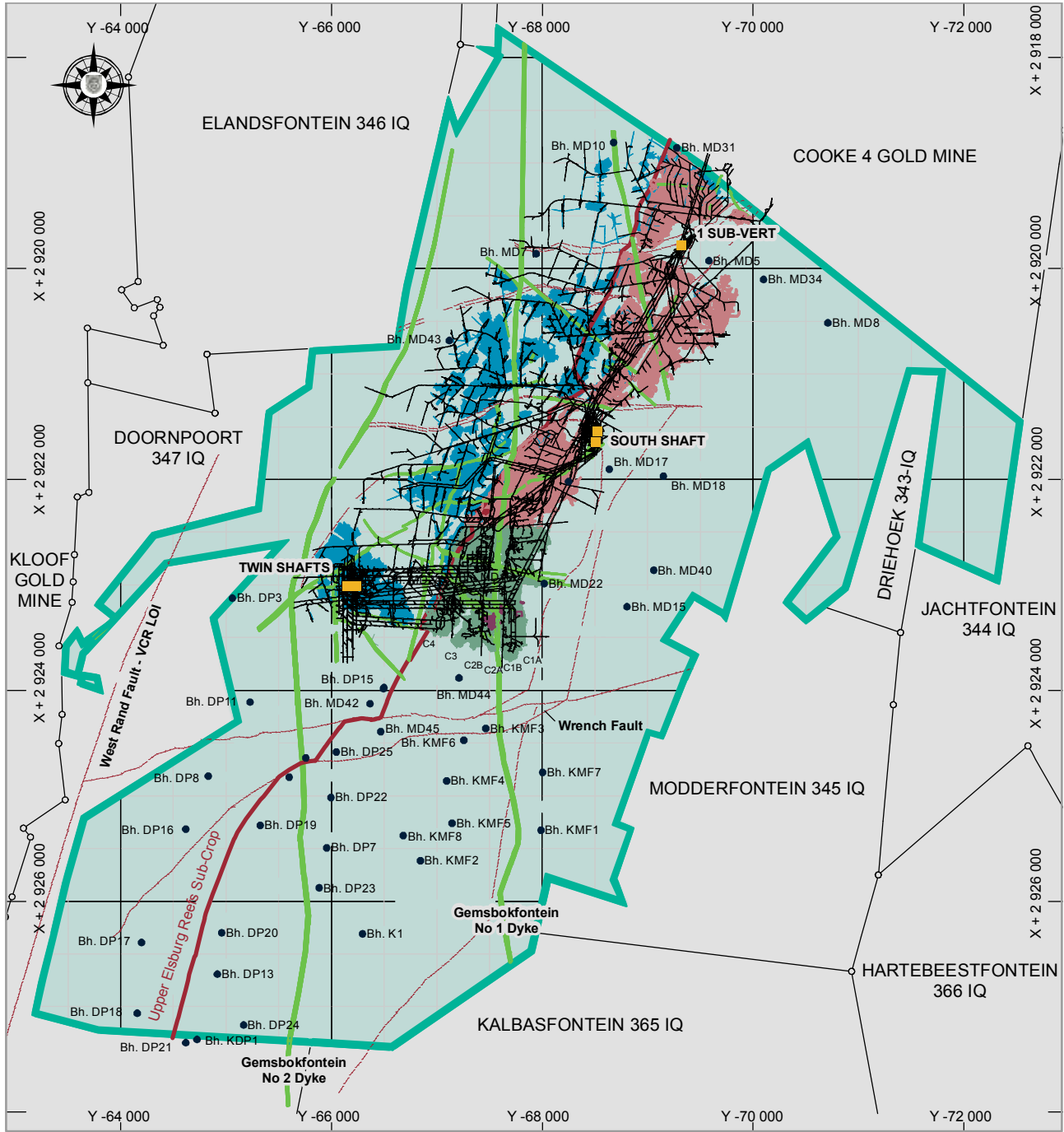
To illustrate the impact of fluctuations in gold price and exchange rates on the current declaration, South Deep has generated sensitivities with respect to Mineral Reserves. The following graph indicates the Managed Mineral Reserve sensitivity at -15%, -10%, -5%, +5%, +10% and +15% to the base reserve (R525,000/kg gold price).

These sensitivities (other than for the base case) are not supported by detailed plans and depletion schedules. They should only be considered on an indicative basis, specifically as such sensitivities assume 100% selectivity, without any operating cost increases.

Mineral Reserve sensitivity



MINE SITE INFRASTRUCTURE LAYOUT

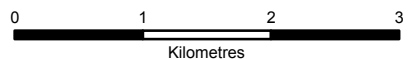


Reference

- | | | | |
|------------------------------|---|------------------------------------|---|
| Farm Boundary | — | Shafts | ■ |
| Dykes | — | Borehole No. and surface position | ● |
| Upper Elsburg Reefs Sub-Crop | — | Mining Corridors | ○ |
| Faults | — | Stoping – Ventersdorp Contact Reef | ■ |
| Mining rights area | — | Stoping – Upper Elsburg Reefs Mine | ■ |
| | — | Development | ■ |
| | — | TM3 and distress | ■ |

**Gold Fields Limited
South Deep Gold Mine**

PLAN SHOWING UNDERGROUND WORKINGS
AS AT DECEMBER 2018



Gause Conform Projection, Central Meridian Lo. 27 East



West Africa region

Tarkwa has now fully transitioned to contractor mining and is well positioned to deliver sustained value, while the best long-term option for Damang to create future cash-flow is being realised through the implementation of the Damang Reinvestment project.

A joint venture with Asanko Gold was completed in July 2018, with Gold Fields acquiring 45% in the mine for approximately US\$185M.

**WEST AFRICA REGION
SALIENT POINTS**

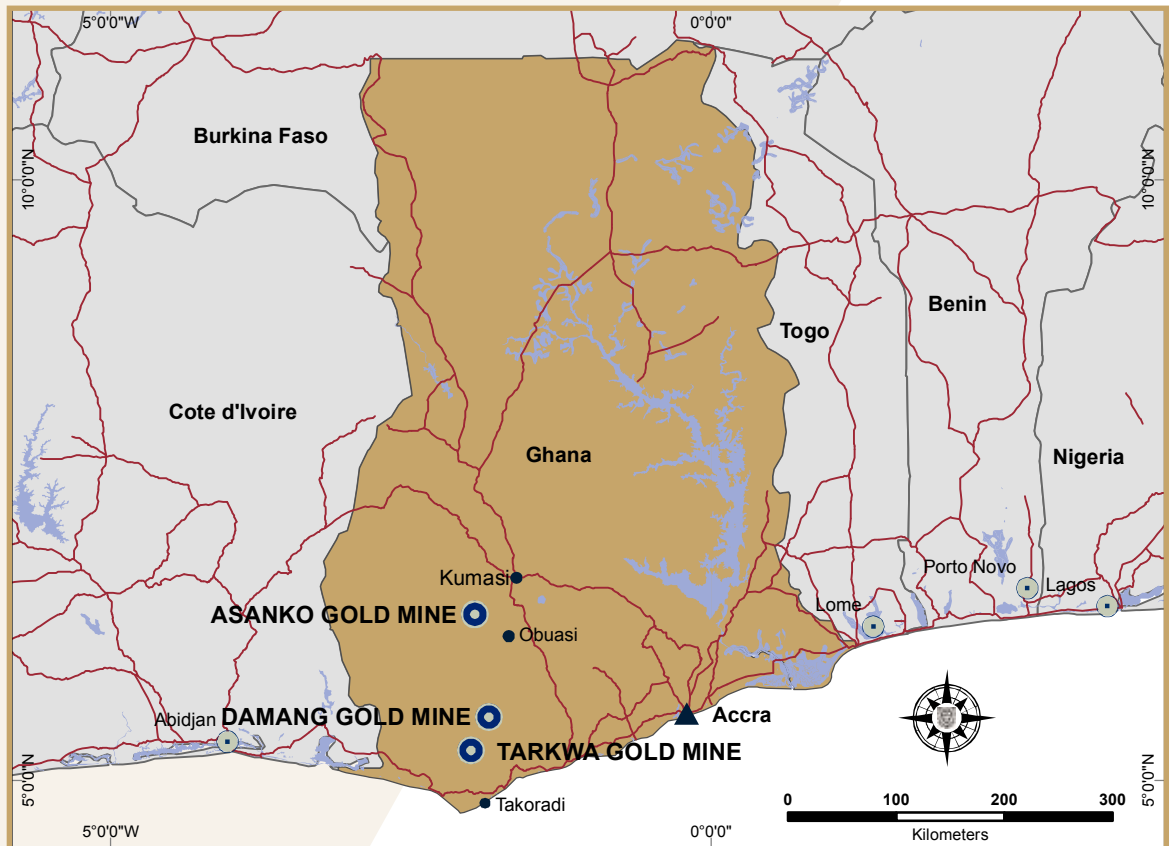
Mineral Resources

16.0Moz*#

* 90% attributable to Gold Fields
Excludes Asanko gold mine

Mineral Reserves

7.4Moz*#



**OPERATIONAL
PROFILE**

	Damang	Tarkwa	Asanko JV
Mining method	Open pit	Open pit	Open pit
Infrastructure	Two open pits and one Carbon in Leach (CIL) gold plant with a current capacity of 4.3Mtpa	Four open pits and one CIL gold plant with a current capacity of 13.5Mtpa	Three open pits and one CIL gold plant with current capacity of 5.4Mtpa
Mineralisation style	Hydrothermal (orogenic) and palaeoplacer	Palaeoplacer	Hydrothermal shear hosted
Mineralisation characteristics	<ul style="list-style-type: none"> Hydrothermal mineralisation hosted within structural shears and fault zones Confined to well-defined prospective structural belts Mineralisation within pods with short-range predictability Exploration and resource definition programmes required to further define controls on mineralisation and continuity Palaeoplacer characteristics are the same as for Tarkwa 	<ul style="list-style-type: none"> Mineralisation hosted within sedimentary conglomerates of the Tarkwaian Group Laterally continuous with mid- to long-range predictability Clear patterns of mineralisation governed by sedimentary characteristics Exploration programmes ongoing to test near-mine palaeoplacer potential 	<ul style="list-style-type: none"> Deposits are typically hydrothermal shear hosted in style and situated within the Kumasi basin within the Asankrangwa Gold Belt Mineralisation is structurally hosted along several regional NE trending shears and within sandstone, siltstone and shale sedimentary packages Most deposits have intrusive tonalitic-porphyrritic granite dyke associations Exploration programmes are ongoing to identify strike and depth extensions to existing ore bodies, and to profile new opportunities along these well-defined structural pathways

West Africa region continued

Regional overview

Gold Fields holds a 90% attributable portion of the Mineral Resources and Mineral Reserves for Tarkwa and Damang, with the remaining 10% held by the Ghanaian government as a free carried interest. A 50:50 interest in the Asanko JV is also held, covering 90% of the Mineral Resources and Mineral Reserves attributable to the JV, with the remaining 10% held by the Ghanaian government as a free carried interest. The West Africa region's Mineral Resource base has increased from 14.8Moz to 16Moz (7.5%), net of depletion. The total Mineral Reserve has decreased from 7.6Moz to 7.4Moz (-3%), net of mined depletion.

The Tarkwa and Damang operations are located in the southern area of western Ghana, 300km by road west of the capital of Accra and approximately 90km north of the port city of Takoradi. The ore bodies are located in the West African Craton, near the southern end of the Tarkwa Basin. They occupy a significant portion of the stratigraphy of the Ashanti Belt, which hosts the important Birimian and Tarkwaian geological series.

The Asanko concessions are located in the Amansie West District of the Ashanti region of Ghana, approximately 250km NW of the capital Accra, and about 50km to 80km SW of the regional capital of Kumasi. The mine exploits a number of hydrothermal ore bodies, which are similar in mineralisation style typically occurring in sub-vertical shear zones and shallow dipping quartz vein arrays frequently in proximity to granitic intrusions.

Damang, which is located 25km NNE of Tarkwa, exploits predominantly fresh hydrothermal mineralisation and limited oxides in addition to palaeoplacer mineralisation similar to that of the Tarkwa gold mine. The hydrothermal mineralisation occurs at the culmination of a regional anticline and is associated with dominantly east-dipping thrust faults and sub-horizontal quartz veins.

The ore body at Tarkwa consists of a succession of stacked tabular

palaeoplacer units consisting of quartz pebble conglomerates (gravel beds called reefs) that are very similar to those mined in the Witwatersrand Basin in South Africa. Tarkwa is currently mining multiple narrow reef horizons from four open pits.

Regional geology

The Damang and Tarkwa ore bodies are located within the Tarkwaian System, which is an important gold mineralised stratigraphic component of the Ashanti Belt in south-western Ghana. The Ashanti Belt is a NE striking, broadly synclinal structure made up of lower Proterozoic sediments and volcanics underlain by the metavolcanics and metasediments of the Birimian System. The Tarkwaian unconformity overlies the Birimian and is characterised by lower-intensity metamorphism and the predominance of coarse-grained, immature sedimentary units.

Asanko deposits are located in the Asankrangwa Belt hosted within the Kumasi Basin sediment. The belt is located east of the Ashanti Belt which hosts the Tarkwa and Damang mines. The geology of Asankrangwa comprises strongly deformed Birimian metasediments, with minor granitic intrusions and mafic igneous rocks. The lithological units are cut by deep NW dipping primary and sedimentary structures. It is this geological and structural architecture that has been important in the localisation of gold mineralisation. Gold mineralisation is linked to at least two separate deformation events and fluid emplacement, with certain similarities to the gold deposits of the Ashanti Greenstone Belts.

Exploration drilling and expenditure

At Damang, the 2018 drilling programme focused on Resource conversion and increasing confidence in the area to the north of the current mining at Amoanda Pit, as well as the upgrade of Inferred material at Damang pit cut-back (DPCB). Work is ongoing on the Amoanda geological and evaluation models. The anticipated revisions to the Amoanda model will include drill hole data returned by the drilling programme undertaken during 2018,

as well as data collated from grade control drilling and in-pit mapping.

At Tarkwa, on-lease drilling continued in 2018 under the accelerated exploration programme targeting near-surface hydrothermal deposits as potential open pit opportunities and extensions to existing palaeoplacer ore bodies. A total of 48.4km of drilling was completed over 31 target areas in both Tarkwa North and Tarkwa South. A total of 29 predominantly hydrothermal targets were downgraded and one target was upgraded to development stage by completing resource definition drilling. A total of 26.1km of drilling was completed on initial and advanced targets while 22.3km of drilling were used for palaeoplacer and hydrothermal resource conversion in three areas (Kobada, Akontansi-underlap north extension, and Pepe West). In addition, a total of 2,571m of mechanised auger drilling were completed over two brownfield targets in Tarkwa North. A ground geophysical survey (ground magnetics) was conducted over a number of targets in Tarkwa South.

In 2019, the team will focus on investigating the near-mine palaeoplacer potential in four main areas. Work in Akontansi-underlap north extension is planned to investigate reef extensions along a 500m strike-length. A 2.2km strike-length potential of the Pepe West trend will also be tested. Two drill fences will be completed in the Teberbie area as part of a programme designed to investigate 'shallow' underground palaeoplacer mining potential.

The region maintains rigorous quality assurance and quality control (QA/QC) protocols on all its exploration programmes. It draws on industry-leading practice for data acquisition and utilises accredited laboratories that are regularly reviewed, both internally and externally. Analytical QA/QC is maintained and monitored through the submission of blanks, certified reference material and duplicates, plus umpire laboratory checks.

	December 2018		December 2017	
	Metres drilled	US\$M	Metres drilled	US\$M
Exploration drilling				
Operations				
Damang	33,857	5.45	35,265	5.66
Tarkwa	48,429	9.00	36,324	5.37
Total West Africa operations	82,286	14.45	71,589	11.03

Exclusive of grade control drilling and Asanko JV drilling

Mineral Resources and Mineral Reserves

Mineral Resources

The Mineral Resources declared are classified as Measured, Indicated or Inferred, as described in the SAMREC Code. Mineral Resource categories are assigned with consideration given to geological complexity, grade variance, drill hole intersection spacing, and proximity of mining development. The following factors apply to the Mineral Resources reported:

- Cut-off grades are calculated for the individual deposits
- The application of realistic modifying factors to ensure a reasonable prospect of eventual economic extraction
- Use of an appropriate in situ economic cut-off grade with tonnages and grades based on the

relevant resource block models, including estimates of any material below the cut-off grade required to be mined to extract the complete economic portion of the Mineral Resource

- Open pit Mineral Resources comprise the material above the nominated cut-off grade within a diluted optimised pit shell and constrained to an optimised minimum mining width

Mineral Reserves

The Mineral Reserve estimates are based on appropriately detailed and engineered life-of-mine (LoM) plans. All design and scheduling work is undertaken to a suitable level of detail by experienced engineers using appropriate mine planning software. The planning process incorporates

realistic modifying factors and the use of appropriate cut-off grades, geotechnical criteria, mining fleet productivities, processing capacities and other techno-economic investigations.

No Mineral Resource or Mineral Reserve will be reported by Gold Fields for Asanko as at 31 December 2018. Although all resource models have been updated with the latest drilling, work is still in progress to complete a trade-off study to optimise extraction, transport and costs at Esaase and finalise the associated PFS. The intention is to complete a fully integrated LoM plan, inclusive of the Esaase open pit, which is expected to be completed in H2 2019.

WEST AFRICA REGION SUMMARY OF THE MINERAL RESOURCE AND MINERAL RESERVE ESTIMATES^{1,2}

Measured, Indicated and Inferred	Mineral Resources				Proved and Probable	Mineral Reserves			
	December 2018			Dec 2017		December 2018			Dec 2017
	Tonnes (Mt)	Grade (g/t)	Gold (Moz)	Gold (Moz)		Tonnes (Mt)	Grade (g/t)	Gold (Moz)	Gold (Moz)
Damang	85.1	2.21	6.06	6.12	Damang	28.9	1.74	1.62	1.73
Tarkwa – open pits	213.2	1.30	8.89	7.58	Tarkwa – open pits	121.4	1.20	4.69	4.83
Tarkwa – surface stocks	73.1	0.46	1.09	1.07	Tarkwa – surface stocks	73.1	0.46	1.09	1.07
Total West Africa	371.4	1.34	16.04	14.78	Total West Africa	223.4	1.03	7.39	7.63

Mineral Resources are inclusive of Mineral Reserves. All tonnes (t) relate to metric units. Rounding-off of figures may result in minor computational discrepancies, where this happens it is not deemed significant. In West Africa (Damang and Tarkwa) the Mineral Resources and Mineral Reserves were determined using a gold price of US\$1,400/oz and US\$1,200/oz, respectively

¹ Managed, unless otherwise stated

² Excludes Asanko gold mine, pending completion of PFS

West Africa region continued

Damang gold mine

Asset fundamentals	
General location	Damang is located in SW Ghana, approximately 300km by road west of Accra, the capital, at latitude 5°11'N and longitude 1°57'W. The Damang concession lies to the north of and joins the Tarkwa concession, which is located near the town of Tarkwa. The area is served by access roads with established infrastructure, and a main road connects the mine to the port of Takoradi, some 90km to the SE.
Licence status and holdings	The Damang concession covers a total area of 26,376ha. All necessary statutory mining authorisations and permits are in place for the Damang mine lease (ML), and Abosso Goldfields is entitled to mine all material falling within the lease. Abosso Goldfields holds an ML in respect of the Damang mine dated 19 April 1995, as amended by an agreement dated 4 April 1996. This lease expires in 2025, but is renewable under its terms and the provisions of the Minerals and Mining Law, by agreement between Abosso Goldfields and the government of Ghana. The licence renewal application submitted to the Minerals Commission for the extension of the Lima South ML was approved by the Minister of Lands and Natural Resources in November 2018.
Operational infrastructure and mineral processing	<p>The Damang plant processes mainly fresh ore, which is sourced from two open pits and existing surface stockpiles.</p> <p>The plant is rated at 4.3Mtpa and is a conventional two-stage grinding circuit using a Semi Autogenous Grind (SAG) and ball mill combination, with pebble crusher and gravity concentration, followed by a CIL recovery process. Gravity gold is collected and treated by the Knelson Gravity concentrators and an in-line Leach Reactor.</p> <p>The East tailings storage facility (ETSF) is decommissioned with deposition of tailings now to the Far East tailings storage facility (FETSF). The FETSF was commissioned in January 2018.</p>
Climate	A tropical climate characterised by two distinct rainy seasons, from March to July and September to November. Average annual rainfall in the area is in excess of 2,200mm. Although there may be minor disruptions to operations during the wet season, there is no operating or long-term constraint on production due to climate.
Local geology and deposit type	The Damang ore body is hosted by a NE plunging antiform, developed within Tarkwaian sediments. The main Damang pit is located near to the closure of the antiform, and all other known palaeoplacer mineralisation is located on the east and west limbs of the Damang anticline. Damang exploits a combination of hydrothermal and palaeoplacer mineralisation.
LoM	It is estimated that the current Mineral Reserve will be depleted in 2025 (seven years).
Sustainable development	<p>Damang retained its OHSAS18001: 2007 (Safety Management System) and ISO14001 (Environmental Management System) certifications following a recertification audit conducted in May 2018. Damang successfully transitioned to ISO14001: 2015 in 2018. The next surveillance audit is scheduled to be carried out in Q2 2019. Damang holds regulatory certificates for environmental compliance. Damang was recertified to the Cyanide Code in June 2018.</p> <p>The mine is awaiting issuance of an environmental permit from the Environmental Protection Agency (EPA) for the FETSF, following payment of the fee in 2018. Applications to renew Damang's water use, mining and explosives permits were submitted to the Water Resources Commission and Minerals Commission in 2018 and the relevant fees were paid. Damang has paid fees for the Environmental Management Plan (2017 – 2020), which was submitted to the EPA in April 2017.</p>

Brief history

Several small mining companies operated the Abontiakoon concession near Tarkwa town, leading to the sinking of eight vertical shafts and the excavation of numerous open pits. In 1882, operations at the underground Abosso mine exploited banket conglomerates to a depth of 850m. In 1920, Adjah Bippo and Cinnamon Bippo underground mines to the north were incorporated into the Abosso mine holdings. Abosso mine ceased operation in 1956 with recorded production of 2.7Moz, at an average gold grade of 9.8g/t.

In 1989, Ranger Exploration (Ranger) began an investigation to retreat tailings from the Abosso mine. Following a drilling programme and subsequent FS from 1993 to 1996, mining a mineralised quartz vein system extending to a depth of 200m was shown to be viable. Gold production started in November 1997. In 2001, Gold Fields and Repadre signed an agreement to purchase Ranger's 90% interest in Damang. IAMGold and Repadre merged to give IAMGold an 18.9% interest in Damang, with Gold Fields retaining a 71.1% interest. Gold Fields acquired the indirect 18.9% IAMGold interest in Damang, increasing their holding to 90% with the remaining 10% held by the Ghanaian government.

The Damang Expansion Project commenced in 2004 to assess the economic viability of the main pit cutback and identify additional sources of ore from areas around the main pit. Following further drilling and a successful FS, the Damang pit cut-back and waste stripping

commenced in July 2005. Additional Mineral Resources from Rex, Tomento North, Tomento East, Tomento West and Huni were added after completion of the regional prospectivity study in 2006.

At the end of 2016, the investment into Damang to extend the LoM to 2025 commenced, and the mine is scheduled to achieve full ore production in 2020. The Damang Reinvestment Project (DRP) targets further cutbacks in the main pit to access the primary higher grade ore body at the bottom of the current Damang pit. The Development Agreement reached between the government of Ghana and Gold Fields supported the DRP.

Damang Reinvestment Project update

The DRP will provide the necessary head grades, mining efficiencies and operational flexibility capable of returning Damang to a financially sustainable and long life. Implementation of the DRP, which started at the beginning of 2017, has progressed ahead of schedule in terms of mining volumes focused on waste stripping to open up the ore zone and is tracking below planned costs.

The critical controls put in place after the main pit east wall deformation in September 2017 have been implemented, and operations have since resumed. In total, 70 depressurisation holes have been drilled on various elevations across the east and west wall slope faces and five dewatering boreholes have been drilled. New blasting protocols have been implemented for the east

wall. Radar monitoring continues to be used to monitor potential ground movement in the east wall area.

The Damang unconstrained study to evaluate the possibility of increasing the Damang Resource and Reserve base to extend the current LoM would entail a maximum main pit cutback to access the deeper portions of the ore body beyond the constraints of the current DRP and specifically the ETSF. The project has progressed from scoping study level in 2018 and is now in its PFS phase.

Key developments and material issues

- The DRP has made excellent progress with traction on total material moved and good compliance to plan
- Ongoing geotechnical stability improvements and optimisation studies including pit wall steepening
- Planned completion of the current Amoanda pit by end Q3 2019
- Successful decommissioning of the ETSF and commissioning of the FETSF tailing dams
- Substantial progress made on the crushing and grinding circuit upgrades
- Mining is now designed to focus on the Damang Complex and potential extensions north of the current Amoanda pits
- The Mineral Reserve declared as at 31 December 2018 is constrained by the ETSF, which is adjacent to the Damang main pit
- The 2019 LoM plan and financials are based on the contractor mining model embedded at the mine

West Africa region continuedDamang gold mine continued**Operating statistics**

	Units	Historic performance		
		Dec 2018	Dec 2017	Dec 2016
Open pit mining				
Total mined	kt	45,937	39,726	18,846
– Waste mined (opex)	kt	7,835	5,341	8,200
– Waste mined (capex)	kt	33,607	31,056	7,827
– Ore mined	kt	4,495	3,329	2,819
Mined grade	g/t	1.68	1.15	1.32
Strip ratio (tonnes)	waste:ore	9.22	10.93	5.68
Processing				
Tonnes treated	kt	4,205	4,590	4,268
Head grade	g/t	1.42	1.05	1.18
Yield	g/t	1.34	0.96	1.08
Plant recovery factor	%	94.1	92.2	91.9
Total Au production	koz	180.8	143.6	147.7
	kg	5,625	4,466	4,595
Financials				
Au price received	US\$/oz	1,266	1,255	1,242
Cost of sales before amortisation and depreciation	US\$M	124	122	136
	US\$/oz	761	847	921
Capital expenditure (capex)	US\$M	139	132	38
	US\$/oz	769	917	256
All-in sustaining cost (AISC)	US\$/oz	813	1,027	1,254
All-in cost (AIC)	US\$/oz	1,506	1,827	1,254
LoM				
Mineral Reserves	Mt	28.9	31.9	31.8
Mineral Reserves head grade	g/t	1.74	1.68	1.64
Mineral Reserves	Moz	1.6	1.7	1.7

Rounding-off of figures presented in this report may result in minor computational discrepancies. Where this occurs, it is not deemed significant

Exploration and resource definition drilling

2017/8 exploration expenditure is presented in the West Africa regional review section.

Exploration drill programmes are designed to assess the magnitude and style of mineralisation. Reverse circulation (RC) hole drilling, using a 120m x 80m grid, is usually employed for initial exploration drill-testing of both palaeoplacer and hydrothermal styles of mineralisation. To optimise exploration spend, diamond drilling is minimised in the initial exploration stages and it is used to establish stratigraphic and structural relationships, while allowing samples to be collected for metallurgical test work.

Exploration activities at Damang focused on extensional and resource conversion at Amoanda. The main focus of the 2018 drill campaign was the phase 2 resource infill drilling from the north of Amoanda Pit 3 up to the southern edge of Tomento East. phase 2 was completed in July 2018, with a total 24,138m of combined RC and diamond drill being achieved. Subsequently, phase 3 Scout drilling was initiated and completed to the north of the phase 2 drilling to test for down plunge extensions to the hydrothermal mineralisation in the Amoanda-Tomento corridor against the Damang Fault. A total of 16 scout holes were completed in 2018, with a combined 8,920m drilled, confirming a 1.5km strike extension to the observed mineralisation. Additional infill drilling will be required to establish the overall economic viability of the Amoanda-Tomento corridor.

Mining

Conventional drill and blast with truck and shovel mining techniques are employed at the two open pits. Mining is configured to blasting 9m flitches benches and are excavated in 3m flitches. Gold mineralisation is mined selectively to cut-off grades, and segregated into grade ranges to

balance the ore production and processing capacities on site to maximise cash. All mining operations are carried out by two contractors – BCM International (BCM) mining the Damang complex pits, and Engineers and Planners Company Limited mining the Amoanda pit. Contractor equipment availability, drill and blast practices, spatial compliance to plan and adherence to geotechnical standards remain key focus areas.

Ancillary equipment such as bulldozers, graders, water trucks, wheel loaders and service trucks support operations through road construction and maintenance, bench preparation, dust suppression and erosion control.

Damang has a progressive reclamation plan, where areas that become inactive are prioritised for rehabilitation through contouring and placement of topsoil, seeding, planting and fertilisation.

Mine planning and scheduling

For all operational plans, a detailed two-year operating and capital cost budget is produced and extended for the LoM production schedule. Of importance is the utilisation of historically achieved data for mining rates and operating costs taking into account realisable benefits from Business Improvement (BI) initiatives and demonstrated advances in innovation and technology (I&T). All capital projects are ranked and prioritised to maximise capital efficiency and return on investment.

Mine planning and pit optimisations are based on three-dimensional block models of in situ mineralisation, with allowances made for minimum mining widths, dilution, ore loss and other modifying factors appropriate to the mining method being considered. Historical performance measures are considered in determining these modifying factors.

Open pit planning involves the input of economic parameters and physical

constraints into optimisation software to generate a series of nested pits from which an optimal shell is selected. Detailed design is then undertaken to confirm the mineability of the optimal shell. All the operating pits in Damang are push-backs, making the pit design exercise critical when it comes to keeping strip ratios low and the ore in line with optimisation results, taking cognisance of minimum mining width restrictions, the characteristics of the ore bodies and the equipment size.

Standard mine planning and design software are used to generate the optimal pit shells, as well as for the design, scheduling and compliance monitoring.

All prevailing capacities, infrastructure, tailings storage facilities, waste disposal and ore stockpile management requirements are incorporated into the planning process.

Innovation and technology

A combination of BI initiatives and relevant I&T (I&T Horizon 1) enhancements are being implemented to reduce operating costs and drive improved performance in 2019 through:

- Optimisation of crushers to improve efficiency and achieve extra throughput (>4.3Mt)
- Evaluation of the SAG Mill motor upgrade (5.8MW to 7.5MW)
- Drill and blast optimisation programme to assist wall steepening and reduce drilling costs through drill rig automation
- Online carbon concentration measurements – carbon scout to minimise soluble gold solution losses

West Africa region continued

Damang gold mine continued

Mineral Resources and Mineral Reserves

The Mineral Resources and Mineral Reserves were updated as at December 2018 and use gold prices of US\$1,400 and US\$1,200 respectively. The December 2018 Mineral Resources have been stated inclusive of Mineral Reserves. All relevant geological models and

resource estimation models have been updated during the year to reflect the latest available datasets.

Mineral Resources

Mineral Resources are classified as Measured, Indicated and Inferred as described in the SAMREC Code and are constrained within an optimised pit shell. Mineral Resources'

categories are assigned with consideration given to geological complexity, grade variance, and drill hole intersection spacing. The Mineral Resources are quoted at an appropriate in situ cut-off grade. Mineral Resources include estimates of any material below cut-off grade that needs to be mined to extract the complete pay portion of the Mineral Resource.

MINERAL RESOURCE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit									
Measured	9,829	10,735	9,772	1.78	1.78	1.84	563	616	579
Indicated	57,681	58,044	57,115	2.30	2.30	2.31	4,259	4,299	4,239
Inferred	15,250	14,983	13,523	2.37	2.38	2.44	1,160	1,147	1,063
Total open pit	82,760	83,762	80,410	2.25	2.25	2.27	5,983	6,062	5,881
Total surface stockpiles	2,385	2,459	4,337	0.98	0.72	0.70	75	57	97
Grand total	85,145	86,221	84,747	2.21	2.21	2.19	6,058	6,119	5,978

MINERAL RESOURCE CLASSIFICATION PER MINING AREA

Area	Measured			Indicated			Inferred			Total		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Damang (incl Saddle)	5,682	1.86	340	40,962	2.47	3,257	12,656	2.52	1,027	59,300	2.43	4,625
Huni	1,131	1.47	53	3,899	1.57	197	256	1.48	12	5,286	1.55	263
Juno	2,328	1.85	138	4,606	2.30	341	13	2.39	1	6,947	2.15	481
Amoanda	0.1	1.99	0.01	5,715	1.85	339	604	1.37	27	6,319	1.80	366
Rex	688	1.39	31	1,907	1.66	102	1,329	1.81	77	3,924	1.66	210
Other	—	—	—	591	1.16	22	392	1.30	16	983	1.22	39
Total open pit	9,829	1.78	563	57,681	2.30	4,259	15,250	2.37	1,160	82,760	2.25	5,983
Stockpiles	2,385	0.98	75	—	—	—	—	—	—	2,385	0.98	75
Grand total	12,214	1.63	639	57,681	2.30	4,259	15,250	2.37	1,160	85,145	2.21	6,058

Modifying factors

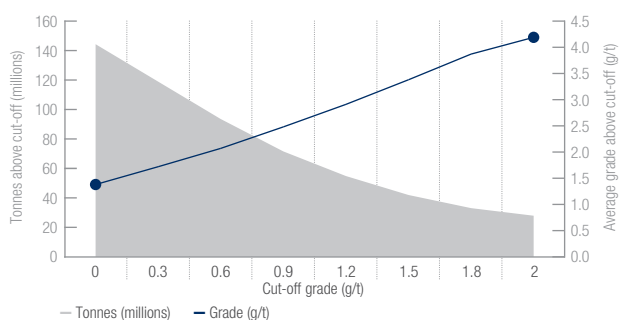
- The Measured and Indicated Mineral Resources are inclusive of those Mineral Resources modified to produce Mineral Reserves
- Unless otherwise stated, all Mineral Resources and Mineral Reserves are quoted as 100% managed and are not attributable with respect to ownership
- All Mineral Reserves are quoted in terms of RoM grades and tonnages as delivered to the metallurgical processing facilities, and are therefore fully diluted
- Mineral Reserves statements include only Measured and Indicated Mineral Resources, modified to produce Mineral Reserves and contained in the LoM plan
- Mineral Resources and Mineral Reserves have undergone extensive internal and external audits during the DRP

		December		
		2018	2017	2016
		Units		
Mineral Resource parameters				
Mineral Resource Au price	US\$/oz	1,400	1,400	1,400
Cut-off for fresh ore	g/t	0.67 – 0.90	0.69 – 0.90	0.69 – 1.01
Cut-off for oxide ore	g/t	0.52 – 0.71	0.51 – 0.70	0.51 – 0.78
Mineral Reserve parameters				
Mineral Reserve Au price	US\$/oz	1,200	1,200	1,200
Cut-off for fresh ore	g/t	0.72 – 0.77	0.72 – 0.77	0.71 – 0.81
Cut-off for oxide ore	g/t	0.55 – 0.60	0.55 – 0.59	0.56 – 0.62
Strip ratio	waste:ore	3.2	4.3	4.6
Dilution (hydrothermal)	%	17 – 25	17 – 25	17 – 30
Dilution (palaeoplacer)	cm	50	50	50
Mining recovery factor	%	95	95	91
Mine Call Factor (MCF)	%	95	95	95
Plant recovery factor – fresh ore	%	91	91	90
Plant recovery factor – oxide ore	%	91	91	90
Processing capacity	Mt/ya	4.3	4.2	4.2

GRADE TONNAGE CURVE

Grade tonnage curve for the entire open pit Mineral Resource is presented below.

Grade tonnage curve – Open pit



West Africa region continued

Damang gold mine continued

Mineral Reserves

The Mineral Reserve estimate for the Damang mine is based on development of appropriately detailed and engineered LoM plans. All design and scheduling work is undertaken to an appropriate level of detail by experienced engineers using appropriate mine-planning software.

The planning process incorporates realistic modifying factors and the use of appropriate cut-off grades, geotechnical criteria, mining fleet productivities, processing capacities and other techno-economic investigations.

In general, Proved Mineral Reserves are derived from Measured Mineral Resources, and the Probable Mineral Reserves are derived from Indicated Mineral Resources. The stockpiles included in the Mineral Reserves comprise mostly lower-grade mineralisation that has been accumulated since the start of mining the Damang pit.

MINERAL RESERVE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit									
Proved	5,520	6,314	5,648	1.42	1.40	1.46	251	284	265
Probable	21,629	24,162	23,069	1.88	1.81	1.80	1,308	1,406	1,336
Total open pit	27,149	30,476	28,717	1.79	1.72	1.73	1,559	1,690	1,601
Surface									
Surface stockpiles	1,729	1,453	3,033	1.02	0.82	0.75	57	38	73
Grand total	28,878	31,928	31,750	1.74	1.68	1.64	1,616	1,728	1,674

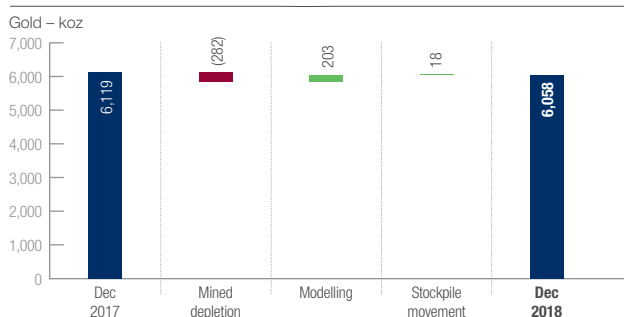
MINERAL RESERVE CLASSIFICATION PER MINING AREA

Mining area	Proved			Probable			Total Mineral Reserve		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Open pit									
Huni	1,239	1.18	47	3,053	1.25	123	4,292	1.23	170
Damang (incl Saddle)	4,281	1.48	204	17,466	2.01	1,129	21,747	1.91	1,334
Amoanda	—	—	—	1,110	1.56	56	1,110	1.56	56
Total open pit	5,520	1.42	251	21,629	1.88	1,308	27,149	1.79	1,559
Surface									
Surface stockpiles	1,729	1.02	57	—	—	—	1,729	1.02	57
Grand total	7,249	1.32	308	21,629	1.88	1,308	28,878	1.74	1,616

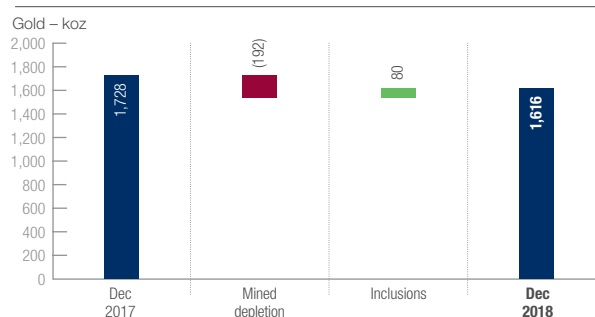
MINERAL RESOURCE AND MINERAL RESERVE RECONCILIATION YEAR-ON-YEAR

Factors that affected Mineral Resource reconciliation year-on-year	Factors that affected Mineral Reserve reconciliation year-on-year
Mined depletions	Mined depletions
Larger resource pit shell at Amoanda	Damang western pit slope optimisation and Amoanda redesign

Mineral Resource reconciliation



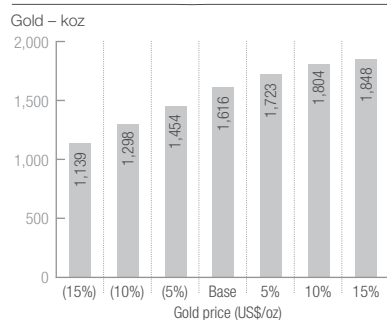
Mineral Reserve reconciliation



Mineral Reserve sensitivity

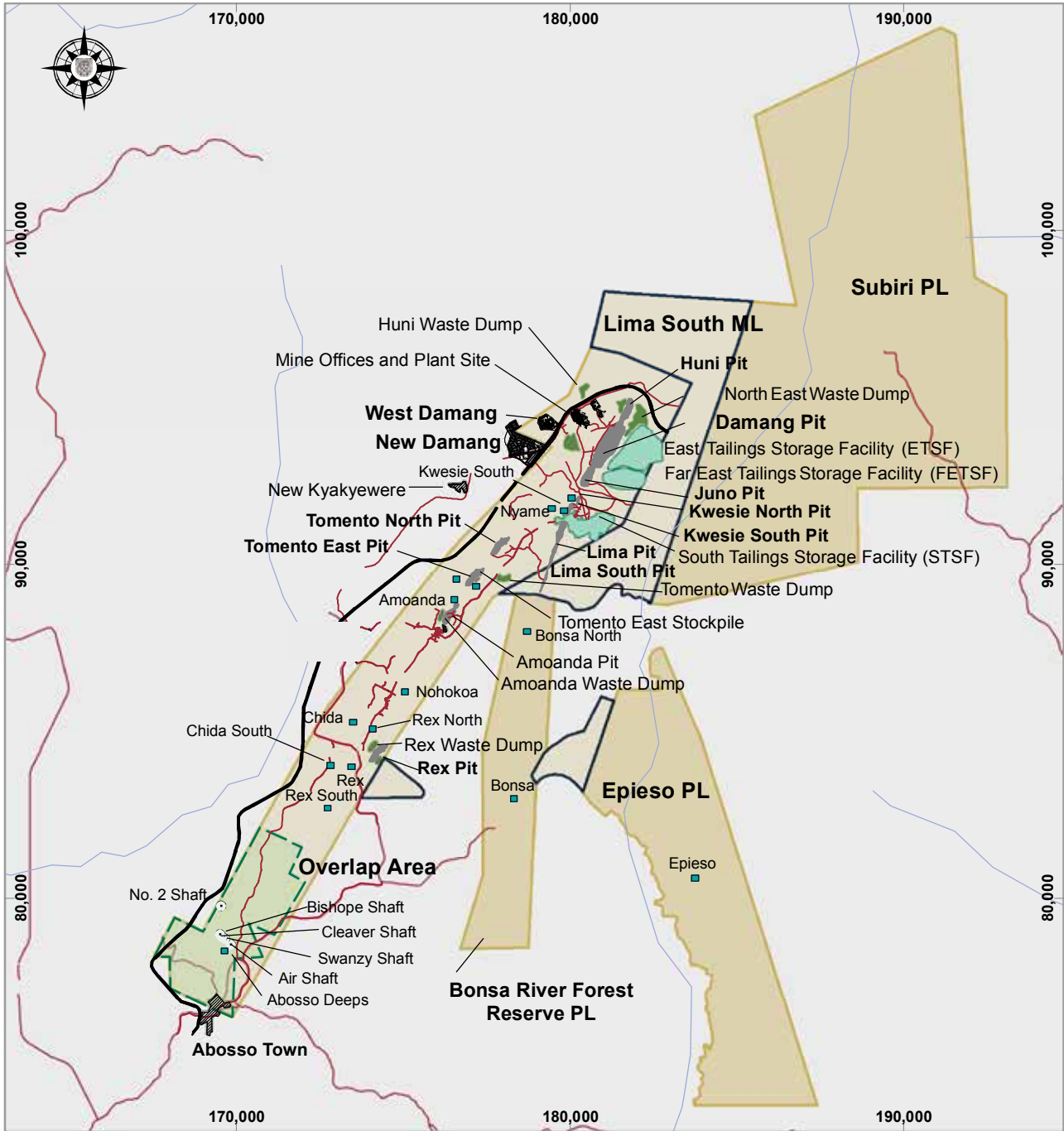
The Mineral Reserve sensitivity has been derived from the inclusion and exclusion of a number of cut-backs at various gold prices. The Mineral Reserve sensitivities are not based on detailed depletion schedules and should be considered on a relative and indicative basis only. The graph below illustrates the Mineral Reserve sensitivity to gold price at ±15% (with 5% increments) and using a base reserve gold price of US\$1,200/oz.

Mineral Reserve sensitivity



West Africa region continued

MINE SITE INFRASTRUCTURE LAYOUT



Reference

- | | | |
|---------------------------|--|----------------------------|
| Roads | | Stockpile |
| Railroad | | Waste Dump |
| Towns | | Exploration Drilling Sites |
| Prospecting Area | | Tailings Storage Facility |
| Mining Lease - Damang | | Open Pit |
| Mining Lease - Lima South | | Damang overlap area |
| | | Damang has surface to 30m |
| | | Tarkwa has below 30m |

Gold Fields Limited Damang Gold Mine

PLAN SHOWING MINE INFRASTRUCTURE AS AT DECEMBER 2018



Ghana National Grid Co-ordinate system



Tarkwa gold mine

Asset fundamentals	
General location	Tarkwa is located in SW Ghana, approximately 300km by road west of Accra, the capital, at latitude 5°15'N and longitude 2°00'W. The Tarkwa gold mine is located 4km west of the town of Tarkwa with good access roads and an established infrastructure. The mine is served by a main road connecting to the port of Takoradi some 60km to the south on the Atlantic coast.
Licence status and holdings	The Tarkwa mine operates under mining leases (MLs) covering a total area of approximately 20,825ha. Five mining leases (MLs), dated 18 April 1997, cover the Tarkwa property, while two MLs, dated 2 February 1988 and 18 June 1992, respectively, cover the Teberebie property. The Tarkwa concession mining leases expire in 2027 and the Teberebie property mining leases expire in 2036. All necessary statutory mining authorisations and permits are in place for the Tarkwa mine lease and Goldfields Ghana (GFG) is entitled to mine all material falling within the lease.
Operational infrastructure and mineral processing	<p>Four large open pits currently exploit the stacked narrow auriferous conglomerates, similar to those mined in the Witwatersrand Basin of South Africa.</p> <p>Ore is processed utilising a conventional CIL plant, with a gyratory crusher feeding a SAG mill and ball mill. Gold is recovered from solution by electro-winning and smelted in an induction furnace. Current plant capacity is 13.5Mtpa.</p> <p>LoM tailings deposition requirements are catered for in the short term by wall raise sequences at the operating TSF 1, 2 and 3 facilities, and in the medium term by TSF 5 whose construction commenced in 2016. In the longer term, LoM tailings deposition requirements will be catered for by planned TSFs 4 and 6.</p>
Climate	A tropical climate, characterised by two distinct rainy seasons, from March to July and September to November. Average annual rainfall near the site is 2,245mm. Although there may be minor disruptions to operations during the wet season, there is no operating or long-term constraint on production due to climate.
Local geology and deposit type	<p>The open pit surface operation currently exploits the tabular auriferous conglomerates similar to those mined in the Witwatersrand Basin of South Africa from four open pits: Pepe-Mantraim, Teberebie, Akontansi and Kottraverchy.</p> <p>The local geology at Tarkwa is dominated by the Banket series, which can be further subdivided into a footwall and hangingwall barren quartzite, separated by a sequence of mineralised conglomerates and pebbly quartzites.</p> <p>The stratigraphy of the individual quartzite units is well-established, with auriferous reefs interbedded with barren immature quartzites. The units thicken to the west and current sedimentological parameters indicate a flow from the east and NE. Structurally, the Tarkwaian Belt has been subject to moderate folding, and at least five episodes of deformation are recognised.</p>
LoM	It is estimated that the current Mineral Reserves will be depleted in 2032 (14 years).
Sustainable development	Tarkwa retained its OHSAS18001: 2007 (Safety Management System) and ISO14001 (Environmental Management System) certifications following an external recertification audit in June 2018. Tarkwa successfully transitioned to ISO14001: 2015 in 2018. Tarkwa has received recertification to the Cyanide Code from the ICMI.

West Africa region *continued*

Tarkwa gold mine *continued*

Brief history

Sinking of the Abontiakoon vertical shaft was completed in 1935 and a central mill with a capacity of 30ktpm was constructed in the following four years. Several small mining companies operated the Abontiakoon concession, but in 1960 all workings were abandoned and allowed to flood. In 1961, production restarted under the State Gold Mining Corporation and in 1963 the Tarkwa mines were renamed Tarkwa Goldfields Limited. The Apinto shaft was sunk in the mid-seventies.

GFG signed a management contract with the Ghanaian government to operate the mine in 1993, and in 1996 completed an FS on an open pit/heap leach operation. In 1998, the initial Tarkwa Phase 1 development was completed for an open pit operation, mining 14.5Mtpa (including 4.7Mtpa of heap leach feed ore). In 1999, the Tarkwa Phase 2 expansion was completed to increase the mining rate to 20.7Mtpa and heap leach feed ore production to 7.2Mtpa. All underground operations and the associated processing plant ceased production in this year.

In 2000, GFG acquired the northern area of Teberebie and mining production was increased to 36Mtpa.

Tarkwa implemented owner mining in July 2004 and commissioned a CIL plant with a nameplate capacity of 4.2Mtpa in October 2004. The expanded CIL plant was commissioned in January 2009 and a design throughput of 12.3Mtpa was achieved in September 2009. Conversion to owner maintenance was completed in 2010.

In 2011, GFG acquired the 18.9% IAMGold interest in Tarkwa and now holds 90%, with the remaining 10% held by the Ghanaian government. At the end of 2013, all heap leach operations ceased.

The CIL plant capacity was increased to 13.5Mtpa late in 2014, and further enhancements to increase the capacity to 15.5Mtpa are being considered.

Tarkwa reverted to a contractor mining model in 2018 after a comprehensive trade-off analysis indicated cash-flow and AIC benefits.

Key developments and material issues

- Reserves decreased 2% with depletion partly offset by pit slope optimisation involving wall steepening in selected areas and the change in business model moving from owner mining to contractor mining which improved the overall cost base
- The mine continues to deliver world-class mining and processing costs. The mine has been restructured to operate at lower total mining volumes (85 to 90Mtpa total mining) to facilitate operational flexibility and underpin targeted head grades to deliver ~500 to 530koz per year
- Mine plan modifications were undertaken at Tarkwa due to blast restrictions applied to the Pepe 8, Atuabo and Mantraim pits, which are close to some of the structures belonging to the Brahaboboom local community. The Minerals Commission has granted approval for blasting activities within 400m of the community, subject to the implementation of blast controls and blasting protocols
- Focus on mining contractor performance will continue in 2019 to drive further productivity improvements, compliance to plan and cost performance
- A gravity circuit was installed and commissioned in July 2018 to recover gravity gold and improve plant recovery
- 2019's exploration campaign will target extensions to existing palaeoplacer ore bodies and very limited work will continue on hydrothermal style prospects

Operating statistics

	Units	Historic performance		
		Dec 2018	Dec 2017	Dec 2016
Open pit mining				
Total mined	kt	89,647	103,788	101,154
– Waste mined (opex)	kt	25,043	35,507	36,091
– Waste mined (capex)	kt	50,428	51,578	50,512
– Ore mined	kt	14,176	16,703	14,551
Mined grade	g/t	1.26	1.34	1.38
Strip ratio (tonnes)	waste:ore	5.3	5.2	6.4
Processing				
CIL				
Tonnes treated	kt	13,791	13,527	13,608
Head grade	g/t	1.22	1.37	1.36
Yield	g/t	1.18	1.30	1.30
Plant recovery factor	%	96.9	96.7	97.0
Total Au production	koz	524.9	566.4	568.0
	kg	16,326	17,605	17,668
Financials				
Average Au price received	US\$/oz	1,271	1,254	1,248
Cost of sales before amortisation and depreciation	US\$M	309	306	327
	US\$/oz	589	541	576
Capital expenditure (capex)	US\$M	156	181	168
	US\$/oz	297	320	296
All-in sustaining cost (AISC)	US\$/oz	951	940	959
LoM				
Mineral Reserves	Mt	194.5	194.7	196.1
Mineral Reserves head grade ¹	g/t	0.92	0.94	0.96
Mineral Reserves	Moz	5.78	5.91	6.08

Rounding-off of figures presented in this report may result in minor computational discrepancies. Where this occurs, it is not deemed significant

¹ Open pit Mineral Reserve grade = 1.2g/t (excluding surface stockpiles)

West Africa region *continued*

Tarkwa gold mine *continued*

Exploration and resource definition drilling

2017/8 exploration expenditures are presented in the West Africa regional review section.

The bulk of the Tarkwa open pit palaeoplacer Mineral Resource has been drilled and classified into the Measured and Indicated Mineral Resource categories at current costs and a gold price of US\$1,400/oz.

Exploration activities focused on Resource infill drilling at the hydrothermal style Kobada project, Underlap North Extension and Akontansi West, with the objective of increasing the level of confidence of unclassified Mineral Resources. In total, 29 hydrothermal targets were drilled tested in 2018, with some encouraging results back from Badukrom, Kobada North and Kobada East. Scout drilling took place at the Pepe West Limb palaeoplacer target. However, the potential size of the hydrothermal style targets has not been promising to date.

In 2019 focus is on extensional infill drilling at underlap North Extension, Teberebie Cut4/Pepe North and Teberebie-Atuabo, where unclassified Resources exist. Scout drilling is to take place along the northern extension of the Underlap target (outside of the current pit shell). Generative work is to continue, looking for new search space for primarily palaeoplacer and secondly hydrothermal opportunities.

The Kottraverchy underground project is being re-evaluated using latest cost and mining method assumptions to assess future potential.

Ground geophysical survey work was carried out over the Kobada trend. This will be continued in 2019 to cover the larger exploration space in Tarkwa south. The outcome of this work will assist the team to better define the Kobada Far South, South Heap Leach and Blue Ridge targets.

Mining

The mine utilises selective surface mining methods to optimise the extraction of the mineralised conglomerate units. Short-term mine planning and forecasts are based on current grade control models. During mining, fresh rock and transitional zones are drilled and blasted in 6m lifts, with excavation in 3m flitches.

The mine has fully transitioned to contractor mining with two main contractors operating. Mining operations are split into two zones. Zone 1 is operated by BCM and consists of the Mantraim, Atuabo and Teberebie pits. Zone 2, consisting of the Akontansi and Kottraverchy pits, is operated by E&P. The transition to contractor mining has provided an opportunity to extend Tarkwa's life by one additional year.

Mine planning and scheduling

The planning cycle commences with the ratification of key input parameters, before producing a compliant and updated Mineral Resource Estimate and block model that is adjusted for all Mineral Resource depletions. This is followed by the planning process, which includes all technical inputs such as geotechnical, hydrogeological and detailed pit engineering, incorporating all modifying factors and fleet productivity rates.

Mine planning is based on 3D block models of in situ mineralisation, with allowances made for minimum mining widths, dilution and ore loss in line with the mining method being considered. Open pit optimisation software, in conjunction with economic parameters and physical constraints is used to generate a series of nested pits for open pit mining. An optimal shell is then selected and a detailed design used to confirm the mineability.

Historic productivity data and operating costs are utilised as the basis from which the operational

budget is benchmarked. All capital projects are ranked and prioritised to maximise capital efficiency and return on investment. Importantly, maintenance of the capital waste strip to secure a steady flow of higher-grade ore to deliver ongoing mining flexibility and cash-flow is strictly monitored.

Innovation and technology

Tarkwa's focus on innovation and technology to drive improvement in performance and costs in 2018 included:

- Implementation of high precision GPS drilling to improve productivity by reducing shift change hours
- Installation of a mobile jib to reduce mill reline by two hours
- Introduction of a collision avoidance system
- Review and optimisation of the fleet management and reporting systems
- Exploiting the new digital-ready drilling fleet at Tarkwa

Mineral Resources and Mineral Reserves

The year-on-year Mineral Resources and Mineral Reserves have changed by +15% and -2% respectively, as a result of mining depletion, resource model and mine design changes, the change to contractor mining, and cost input updates.

Stockpile tonnage and grade estimates are based on accumulations of estimated tonnage and grades trucked throughout the history of the mine, and are therefore considered to be reasonably accurate. However, the grades and tonnages are discounted by 5% for processing purposes, as experience has shown that this is realistically achievable when reclaiming a stockpile. Unless otherwise stated, all Mineral Resources and Mineral Reserves are quoted as 100% managed and are not attributable with respect to ownership.

Mineral Resources

The Mineral Resource and Mineral Reserve estimates have been updated using the current Gold Fields planning gold price of US\$1,400/oz and US\$1,200/oz respectively, and reported in accordance with the SAMREC Code. The surface sources include stockpiles that are supported by adequate sampling, and are thus classified as Measured Mineral Resources, plus the South Heap Leach material, which is classified as Indicated.

Mineral Resources are quoted at an appropriate in situ economic cut-off grade, with tonnages and grades based on the Resource block model. Mineral Resources include estimates of any material below the cut-off grade that is required to be mined in order to extract the complete pay portion of the Mineral Resource.

MINERAL RESOURCE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open pit									
Measured	57,952	58,700	66,833	1.44	1.45	1.47	2,680	2,741	3,160
Indicated	138,577	108,342	110,820	1.25	1.33	1.33	5,591	4,634	4,746
Inferred	16,643	5,497	5,577	1.16	1.18	1.17	621	209	210
Total open pit	213,172	172,538	183,230	1.30	1.37	1.38	8,891	7,584	8,116
Surface									
Measured stockpiles	13,139	12,245	8,440	0.76	0.77	0.76	320	303	207
South Heap Leach (Indicated)	59,977	59,977	59,977	0.40	0.40	0.40	771	771	771
Total surface	73,116	72,222	68,416	0.46	0.46	0.44	1,091	1,074	978
Grand total	286,288	244,760	251,646	1.08	1.10	1.12	9,983	8,658	9,094

MINERAL RESOURCE CLASSIFICATION PER MINING AREA

Area	Measured			Indicated			Inferred			Total Mineral Resource		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Akontansi	19,933	1.25	802	107,088	1.21	4,157	14,387	1.14	526	141,407	1.21	5,484
Kottraverchy	10,192	1.66	545	73	0.99	2	—	—	—	10,266	1.66	547
Pepe/Mantraim	10,648	1.45	496	11,143	1.22	435	2,166	1.31	91	23,957	1.33	1,022
Teberebie	16,681	1.50	806	19,426	1.51	943	—	—	—	36,107	1.51	1,748
Kobada	498	1.97	32	847	1.97	54	90	1.37	4	1,435	1.93	89
Total open pit	57,952	1.44	2,680	138,577	1.25	5,591	16,643	1.16	621	213,172	1.30	8,891
Surface												
Spent Ore (South Heap Leach)	—	—	—	59,977	0.40	771	—	—	—	59,977	0.40	771
Surface stockpiles	13,139	0.76	320	—	—	—	—	—	—	13,139	0.76	320
Total surface	13,139	0.76	320	59,977	0.40	771	—	—	—	73,116	0.46	1,091
Grand total	71,091	1.31	3,000	198,554	1.00	6,362	16,643	1.16	621	286,288	1.08	9,983

West Africa region continued

Tarkwa gold mine continued

Modifying factors

- The Measured and Indicated Mineral Resources are inclusive of those Mineral Resources modified to produce Mineral Reserves in the LoM plan
- All Mineral Reserves are quoted in terms of RoM grades and tonnages

as delivered to the metallurgical processing facilities and are therefore fully diluted

- Unless otherwise stated, all Mineral Resources and Mineral Reserves are quoted as 100% managed and are not attributable with respect to ownership

- Mineral Resources and Mineral Reserves undergo regular internal and/or external audits, and any issues identified are rectified at the earliest opportunity

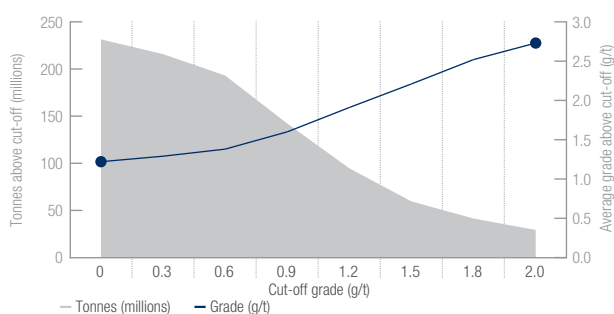
	Units	December		
		2018	2017	2016
Mineral Resource parameters				
Mineral Resource Au price	US\$/oz	1,400	1,400	1,400
Cut-off for mill feed	g/t	0.35	0.37	0.4
Mineral Reserve parameters				
Mineral Reserve Au price	US\$/oz	1,200	1,200	1,200
Cut-off for mill feed	g/t	0.42	0.44	0.47
Mining recovery factor (open pit)	%	100	100	100
Strip ratio (waste:ore)	ratio	5.1	5.0	5.1
MCF	%	97	98	98
Dilution open pit ¹	cm	30/20	30/20	30/20
Plant recovery factor – CIL	%	97.2	97.0	97.0
CIL processing capacity	Mt/pta	13.7	13.7	13.5

¹ Refers to 30cm hangingwall and 20cm footwall dilution respectively

GRADE TONNAGE CURVE

Grade tonnage curve for the entire open pit Mineral Resource is presented below.

Grade tonnage curve – Open pit



Mineral Reserves

The Mineral Reserve estimate for Tarkwa gold mine is based on the development of appropriately detailed and engineered LoM plans. All design and scheduling work is undertaken to an applicable level of detail by experienced engineers using mine-planning software. The planning process incorporates realistic modifying factors and the use of appropriate cut-off grades, geotechnical criteria, mining fleet productivities and other techno-economic investigations.

Mineral Reserve statements include only Measured and Indicated Mineral Resources modified to produce Mineral Reserves contained in the LoM plan. This declaration is based on the premise that all the ore will be treated through the CIL plant.

MINERAL RESERVE CLASSIFICATION

Classification	Tonnes (kt)			Grade (g/t)			Gold (koz)		
	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016	Dec 2018	Dec 2017	Dec 2016
Open Pit									
Proved	43,534	40,464	53,542	1.24	1.26	1.28	1,731	1,644	2,200
Probable	77,874	82,015	74,150	1.18	1.21	1.22	2,956	3,188	2,903
Total open pit	121,408	122,479	127,692	1.20	1.23	1.24	4,687	4,832	5,104
Surface									
Proved stockpiles	13,139	12,245	8,440	0.76	0.77	0.76	320	303	207
South Heap Leach (Probable)	59,977	59,977	59,977	0.40	0.40	0.40	771	771	771
Total surface	73,116	72,222	68,416	0.46	0.46	0.44	1,091	1,074	978
Grand total	194,525	194,701	196,108	0.92	0.94	0.96	5,778	5,906	6,082

¹ Open pit Mineral Reserve grade = 1.20g/t (excluding surface stockpiles)

MINERAL RESERVE CLASSIFICATION PER MINING AREA

Area	Proved			Probable			Total Mineral Reserve		
	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)	Tonnes (kt)	Grade (g/t)	Gold (koz)
Open pit									
Akontansi	18,523	1.09	651	64,888	1.14	2,372	83,411	1.13	3,023
Kotraverchy	4,428	1.38	196	—	—	—	4,428	1.38	196
Pepe/Mantraim	4,345	1.26	176	562	0.75	14	4,907	1.20	189
Teberbie	15,780	1.34	682	12,178	1.43	558	27,958	1.38	1,240
Kobada	458	1.76	26	246	1.56	12	704	1.69	38
Total open pit	43,534	1.24	1,731	77,874	1.18	2,956	121,408	1.20	4,687
Surface									
Spent Ore (SHL)	—	—	—	59,977	0.40	771	59,977	0.40	771
Surface stockpiles	13,139	0.76	320	—	—	—	13,139	0.76	320
Total surface stockpiles	13,139	0.76	320	59,977	0.40	771	73,116	0.46	1,091
Grand total	56,673	1.13	2,051	137,851	0.84	3,728	194,525	0.92	5,778

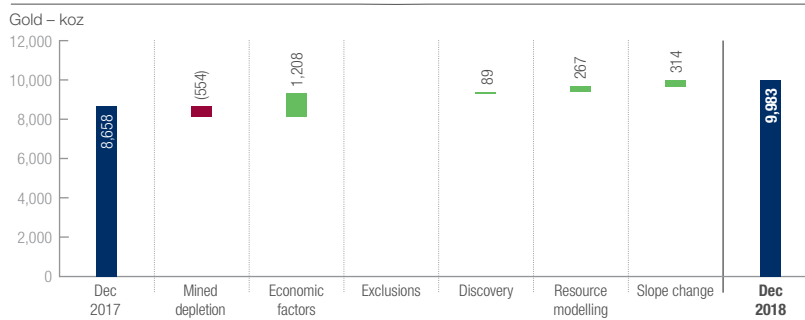
West Africa region continued

Tarkwa gold mine continued

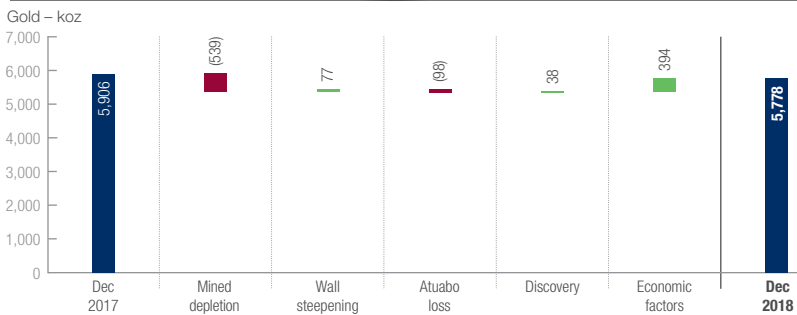
MINERAL RESOURCE AND MINERAL RESERVE RECONCILIATION YEAR-ON-YEAR

Factors that affected Mineral Resource reconciliation	Factors that affected Mineral Reserve reconciliation
Depletion by mining	Depletion by mining
Updated economic factors	Improved costs/impact of contractor mining
Mineral Resource model updates, predominately at Akontansi and PAMTA	Mineral Resource model updates
Pit wall steepening in selected areas	Re-optimisation/re-engineering of pit designs at Teberebie and Akontansi – pit wall steepening in selected areas

Mineral Resource reconciliation



Mineral Reserve reconciliation

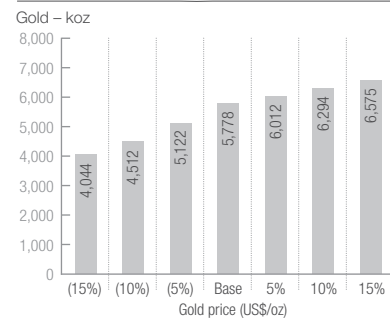


Mineral Reserve sensitivity

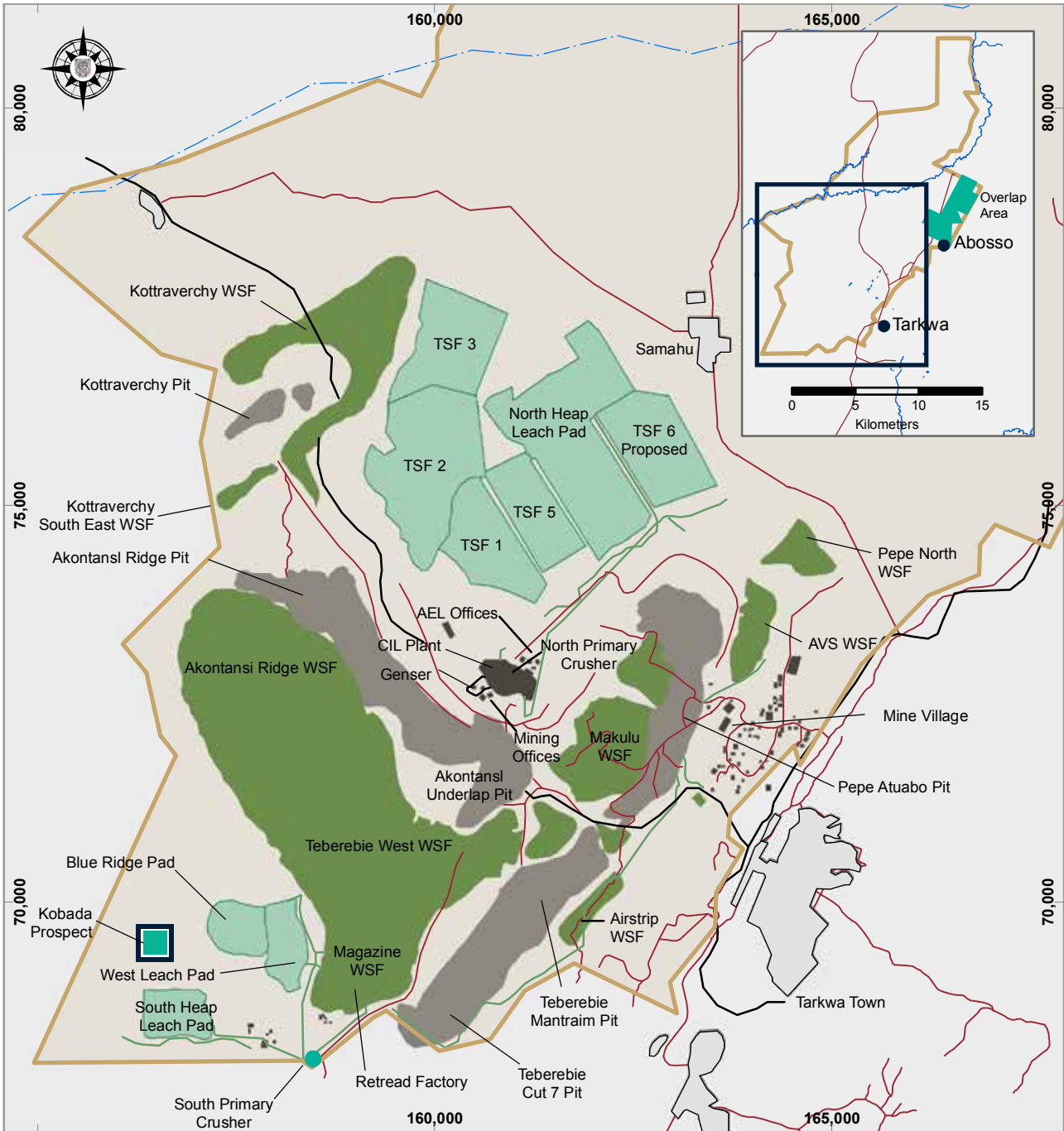
The Mineral Reserve sensitivity has been derived from the application of the relevant cut-off grades to individual grade tonnage curves of the optimised pit shells for the open pits.

The Mineral Reserve sensitivities are not based on detailed depletion schedules and should be considered on a relative and indicative basis only. The following graphs indicate the Managed Mineral Reserve sensitivity at -15%, -10%, -5%, base reserve gold price (US\$1,200/oz), +5%, +10% and +15% to the gold price.

Mineral Reserve sensitivity



MINE SITE INFRASTRUCTURE LAYOUT

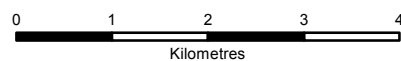


Reference

- | | | | |
|---------------|--|---------------------------------|--|
| Roads | | Pipeline | |
| Railroad | | Building | |
| Town | | Open Pit | |
| Prospect | | Tailings Storage Facility (TSF) | |
| Mining Leases | | Waste Storage Facility (WSF) | |
| | | Damang overlap area | |
| | | Damang has surface to 30m | |
| | | Tarkwa has below 30m | |

**Gold Fields Limited
Tarkwa Gold Mine**

PLAN SHOWING MINE INFRASTRUCTURE AS AT DECEMBER 2018



Ghana National Grid Co-ordinate system

West Africa region continued



Asanko gold mine JV

Asset fundamentals	
General location	The Asanko concessions are located in the Amansie West District of the Ashanti Region of Ghana, approximately 250km NW of the capital Accra, and about 50km to 80km SW of the regional capital of Kumasi. There are daily flights from Accra to Kumasi and, in addition, there is an airstrip located adjacent to the Obotan project site, which is used by Asanko to transport staff and service providers to and from Accra. Existing road access to the site is available from the west, south and east, but the main access used will be from the ports of Tema and Takoradi to the south via Kumasi, or Obuasi. Total distance from Tema to the project site, via Kumasi, is approximately 400km.
Licence status and holdings	Asanko holds six valid mine leases (MLs), as well as prospecting and reconnaissance licences, which collectively make up AGM and span 30km strike length of the Asankrangwa Gold Belt. The mining lease concessions cover an area of approximately 213.2km ² , between latitudes 06°12'N and 06°35'N, and longitudes 02°5'W and 01°51'W. The Esaase, Abore, Abirem, Datano, Jenni River and Adubea MLs contain all of the Mineral Resources defined to date. All other concessions held by Asanko Gold in the area reflect exploration potential.
Operational infrastructure and mineral processing	<p>The Asanko processing plant was commissioned during Q4 2015 and is currently operating at a throughput of 5.4Mtpa and achieving recoveries in excess of 92%. The design is based on a typical single stage crushing, SAG and ball milling circuit followed by a CIL plant. The flow sheet includes a single-stage jaw crusher (complete with pebble crusher) and ball milling unit in closed circuit with classification cyclones. A gravity recovery circuit (4 x Knelsons) is utilised to recover coarse free gold (approximately 40%) from the recirculating load. Thickener underflow is pumped directly to a pre-oxidation stage followed by a seven-stage CIL circuit. Leached gold absorbs onto activated carbon. Loaded carbon is directed to the 5t elution circuit while tailings gravitate to the cyanide destruction circuit.</p> <p>Absorbed gold is eluted from the activated carbon via the split AARL (carbon stripping system) procedure. The pregnant leach solution is routed to the electro-winning circuit after which it is mixed with fluxes and loaded into an induction-smelting furnace.</p> <p>The TSF will consist of a multi-zoned downstream perimeter embankment, comprising a total footprint area of 378ha (basin area 278ha for the final TSF). The TSF is designed to store a total of 95Mt over the LoM. Expansion of the TSF is feasible without significant change to the design parameters, and up to 120Mt capacity has been considered in the design process.</p>
Climate	A tropical climate, characterised by two distinct rainy seasons from March to July and September to November. Average annual rainfall in the area is in excess of 2,200mm. Although there may be minor disruptions to operations during the wet season, there is no operating or long-term constraint on production due to climate.
Local geology and deposit type	<p>Although each gold occurrence within Asanko has its own local mineralisation style, geological and geophysical studies have profiled a similar mine scale setting for all the deposits discovered to date. There is an underlying structural relationship between reactivated WNW basement structures and the dominant NE-SW shears that have juxtaposed the sandstone, siltstone and lesser shale metasedimentary packages, coupled with NS structures that may control flexures in the steeply dipping sediments. All deposits have intrusive tonalitic – porphyritic granite dykes.</p> <p>Episodic gold mineralisation has occurred at least twice during distinct deformational events.</p> <p>Gold occurs largely as free particles. It is deposited in economic concentrations predominantly around zones of rheological contrast between sandstone (porous) and siltstone facies (non-porous) that are sub-vertical shear zones, as well as in late, shallow dipping conjugate quartz vein arrays that transgress rheologically contrasting metasedimentary units and the later granite intrusives.</p>
LoM	Post completion of additional drilling and subsequent extensive resource modelling updates, a new integrated LoM is being generated that aims to include the Esaase FS outcomes.
Sustainable development	Asanko has fully implemented its Fihankra safety system, which is based on OHSAS18001. Asanko is audited annually by the Minerals Commission which is executed against the EPA Akoben safety and environmental performance criteria. The purpose of the audit is to determine the level of implementation of operational safety standards, and environmental performance initiatives as per the Akoben criteria. Asanko is fully permitted to execute its current operational plan.

Brief History

The Asanko project area encompasses over 70km of strike length from Esaase in the north to the Fromenda targets (~20km south of the Nkran pit). The project area was previously owned by Resolute's Amansie Mining Operations, commonly known as the Obotan mine.

Nkran

In the early 1990s, the project concessions were examined by American consultant, Al Perry, who worked on behalf of two related Australian junior companies: Associated Gold Fields (AGF) and Kiwi International Resources (KIR). AGF and KIR quickly assessed the open pit potential of the Nkran prospect. A deal was completed by May 1996 whereby the combined interests of KIR and AGF were bought out by Resolute. Initial mining started early in 1997 and first gold was poured by May 1997. The Nkran mine closed in 2001 having produced 590,743oz gold at an average grade of 2.35g/t gold. The mine was dewatered and re-opened in 2015 to 2016 by Asanko Gold as a deeper opencast operation, with an estimated LoM at that time of 12 years. Satellite ore bodies within 10km of the Nkran pit include Adubiaso, Asuadai, Dynamite Hill and Akwasiso.

Abore

The Abore area was covered in a prospecting concession granted to the Oda River Gold Mining Company. In the mid-1990s, Mutual Resources of Vancouver, Canada, in partnership with Leo Shield Exploration of Perth, Australia, completed a JV with the Oda River group. In the late 1990s, Mutual's interest in the project was bought out by Leo Shield Exploration (later Shield Resources). In early 2001, an agreement was reached with Resolute whereby ore was trucked from Abore north to the Nkran plant for treatment.

Esaase

The Esaase area was previously mined by an alluvial mining company, Bonte Resources, which went into liquidation, returning the concessions to the government of Ghana. The Esaase mining concession, including the camp facilities at Tetrem, was bought from the BLC by Sametro Company Limited, a private Ghanaian company. In May 2006, Asanko Gold, then called Keegan, signed a letter of agreement with Sametro to earn 100% of the Esaase mining concession over a three-year period. The concessions were subject to a systematic exploration and drilling programme which discovered the Esaase deposit.

Midlands Kaniago

Asanko Gold acquired the Midlands Kaniago tenements in January 2015 from Midlands Minerals Corporation Limited (Midlands).

JV

During 2018, Gold Fields acquired a 50% stake in Asanko Gold's 90% interest in the Asanko gold mine.

Key developments and material issues

- No Mineral Reserves or Mineral Resources will be reported as at 31 December 2018. Updated estimates are scheduled to be completed and available in H2 2019
- The JV has embarked on a comprehensive review of the geological models and undertaken extensive relogging exercises where required, incorporating new drilling information from the 2017 and 2018 drill programmes. The enhanced geological models have been incorporated into the resource estimation programme initiated in H2 2018, involving all the significant open pits at the mine, which will generate an updated set of resource block models by Q1 2019
- An Esaase project option analysis and resultant FS will be completed with the intent of supporting a new integrated LoM plan for Asanko. This will inform a revised Resource and Reserve statement, and is anticipated to be finalised by H2 2019
- Metallurgical test work remains ongoing to achieve a full profile of metallurgical parameters at Esaase for inclusion in the FS

West Africa region continued

Asanko JV continued

Exploration and resource definition drilling

Exploration activities within Asanko include extensional and resource conversion projects. Exploration during 2018 focused on:

- An extensive relogging programme (43,350m) and infill drilling (5,000m) at the Esaase deposit to improve the definition of the oxidation surfaces down to a 1.5 year pit outline in preparation for start-up operations in 2019 and, secondly, the relationship of litho-structural geological controls (faults and shears) on gold mineralisation
- Infill drilling at the Akwasiso pit (5,200m) and Esaase South prospect (2,260m) to improve geological definition and resource estimation
- Relogging exercises of the Esaase South (6,950m) and Aboe (5,450m) drill core to enhance and improve Mineral Resource estimations for these satellite ore bodies
- Ground reconnaissance of a number of generative regional targets identified from the reinterpretation of geophysical data and the understanding of the role played by basement structures as the key to gold mineralisation on the Asankrangwa Belt

Mining

The mining method for the four active Asanko ore bodies utilises contract miners and is conventional open pit, truck and shovel and drill and blast operations. Vegetation, topsoil and overburden are stripped and stockpiled for future reclamation use. The ore and waste rock are mined with 6m benches, drilled, blasted and loaded into rigid framed haul trucks (94t) with hydraulic excavators (17m³). The primary mining fleet of trucks and excavators is supported by standard open pit drilling and auxiliary equipment. Grade control drilling ahead of mining is standard practice. Mining operations occur around the clock on two 12-hour shifts. A pre-split wall control method is being implemented along all the pit walls in the fresh zones to ensure the stability of the pit walls.

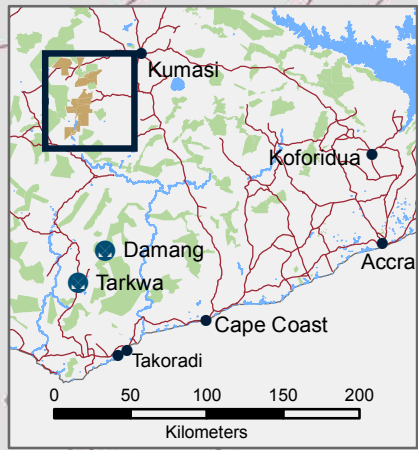
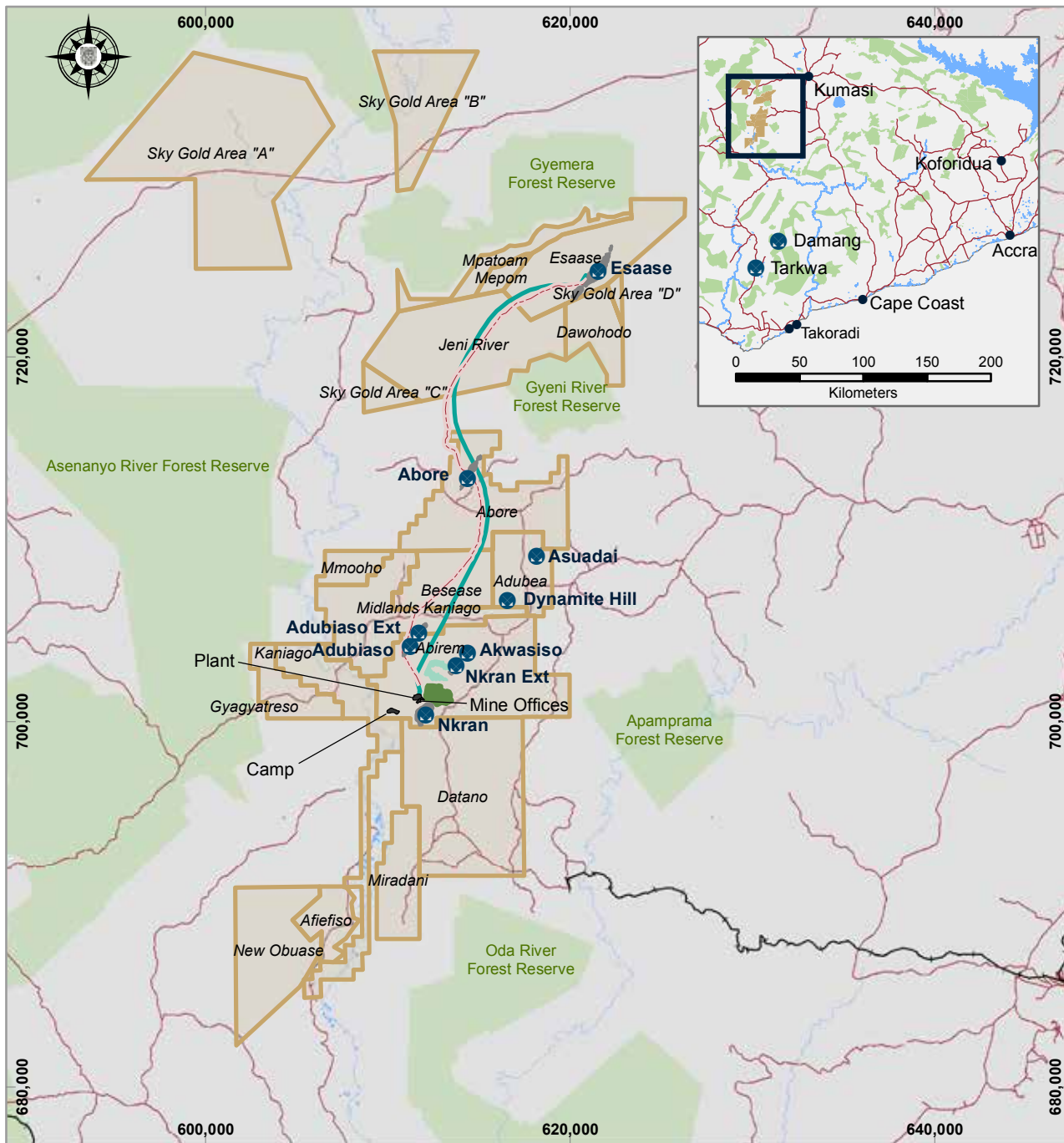
Mine planning and scheduling

Open pit optimisation software, in conjunction with economic parameters and physical constraints, is used to generate a series of nested pits for open pit mining. An optimal shell is then selected and a detailed design used to confirm the LoM.

Mine planning is based on 3D block models of in situ mineralisation, with allowances made for minimum mining widths, dilution and ore loss in line with the mining method being considered. Historical performance measures are considered in determining these modifying factors.

Infrastructure, TSFs, waste disposal and ore stockpile management requirements are incorporated into the planning process.

MINE SITE INFRASTRUCTURE LAYOUT

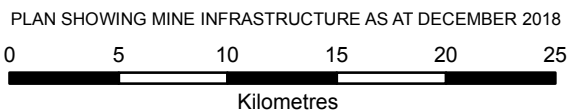


Reference

- River
- Railway
- Roads
- Waterbodies
- Forest Reserve
- Building
- Asanko Deposits
- Asanko Leases

- Esaase-Obotan Haul Road
- Proposed Conveyor Belt Route
- Open Pit
- Waste Rock Dump
- Tailings Storage Facility (TSF)

Gold Fields Limited
Asanko Gold Mine



Co-ordinate System: WGS 1984 UTM Zone 30N
Projection: Transverse Mercator



Supplementary information

Internal technical reviews have been conducted by the Competent Persons as listed, who are full-time employees of Gold Fields Limited and working for the respective operation or region. Corporate technical oversight, assurance and compliance are provided by the Group Technical Services team (see p19).

Competent persons

Regional and operational Competent Persons

Americas region Cerro Corona

P Gómez: Vice-President Technical (Geological Engineering), Nacional San Antonio Abad del Cusco. Certified in applied geostatistics, MBA, Adolfo Ibañez Business School MAusIMM (No 330373), Diplomate in Geometallurgy CIP (No 130253).

Industry experience: He has over 20 years' relevant experience and is responsible for the overall accuracy, standard, and compliance of this declaration.

Gabriel Becerra: Technical Services Manager

Geological Engineering, Master in Geomechanics, CIP (12337).

Industry experience: He has 15 years' relevant experience with six years at Cerro Corona and is responsible for the overall accuracy, standard, and compliance of this declaration.

J Yupa: Chief Mine Planning Engineer

Mining Engineering; MBA

Industry experience: He has 12 years' relevant experience and is responsible for the compliance of the LoM planning, scheduling and Mineral Reserve statement for Cerro Corona.

Edwin Ayala: Chief Mine Geologist

Geological engineering, MSc
Diplomate in Geometallurgy
CIP (108874).

Industry experience: He has six years' relevant experience with eight years on Cerro Corona mine and is responsible for the structural and geological interpretation at Cerro Corona.

Americas region Salares Norte

N Brewer: Senior Geological Advisor (retired) – Americas region

BA Geology. AIPG CPG (No 7042).

Industry experience: He has 43 years' relevant experience and is the lead Competent Person and is responsible for the overall accuracy, standard and compliance of the declaration.

A Trueman: Chief Resource Geologist – Americas region

BSc Geology (Hons). PGeo, APEGBC (No 149753), MAusIMM (No 110730).

Industry experience: He has 26 years in mining, exploration, and resource evaluation on worldwide projects, and is responsible for Mineral Resource estimation and reporting.

Dr Michael I Brittan: President – Brittan Process Consulting, LLC

BSc (ChemEng), MSc (ChemEng)
MS (ChemEng), PhD (ChemEng),
MDP(BusMgmt. MSME
(No 04100876), MSAIMM
(No 19049).

Industry experience: He has over 51 years' experience in international mining projects and metallurgical extraction operations and is responsible for metallurgical test work and metallurgical processing and recovery evaluation and modelling.

Carlos Guzmán Pérez: Principal Mining Engineer, NCL Ingeniería y Construcción SpA

BSc(Eng) Mining Engineering,
CMC (0119) registered with the
Comision Calificadora de
Competencias en Recursos y
Reservas Mineras, FAusIMM
(No 229036).

Industry experience: He has 24 years' experience reviewing and reporting as a consultant on numerous exploration, mining operations, and projects worldwide for due diligence and regulatory requirements and is responsible for Mineral Reserve estimation and reporting.

Esteban Hormazabal Zuñiga: Principal Consultant (Rock Mechanics), SRK Consulting (Chile) SpA

MSc (Geophysics), Mining Civil Engineer, MAusIMM (No 304419), MSAIMM (No 709016), registered (0209) in the Competent Person Public Registry for Resources and Reserves of Chile in the discipline of Mining (Geomechanics).

Industry experience: He has 24 years' experience in mining, geomechanical, and hydrogeology studies and is responsible for geotechnical and hydrogeology studies.

Australia region

I Suckling: Vice-President Technical
BAppSc. WASM, FAusIMM
(No 111090).

Industry experience: He has 38 years of relevant mining experience and is responsible for the overall conduct and standard of technical work for the purposes of estimating and reporting Resources and Reserves from a regional perspective.

Competent persons continued

Regional and operational Competent Persons continued

Australia region

M Jolly: Manager Regional Geology
MSc (Geology); EDP (Wits). COM
Cert. Rock Eng. MAus IMM
(No 304960).

Industry experience: He has 38 years' relevant geological and mining experience and has the responsibility for regional oversight of mine and exploration geology. He is the lead competent person for the region.

T Strickland: Principal Resource Geologist

BSc (Hons) Economic Geology,
CODES, MAusIMM (No 211953);
AIG (No 6761).

Industry experience: He has 15 years' relevant experience and is responsible for Mineral Resource estimation and reporting from a regional perspective.

F Phillips: Technical Manager

BEng (Hons) (Mining); MAusIMM
(No 1125384).

Industry experience: She has 21 years' of relevant experience in the mining industry and is responsible for the overall accuracy, standard and compliance of mine planning, schedules and Mineral Reserve estimation, LoM compilation and financial evaluation from a regional perspective.

R Radford: Regional Metallurgist

BBS (Chemistry and Extractive)
Metallurgy MAusIMM; (No 211859).

Industry experience: He has 21 years' relevant experience and is responsible for the completion and validation of the metallurgical comminution and extractive test work programmes, gold metal reconciliations and processing plant LoM financial estimation from a regional perspective.

Australia region

Agnew

P Burge: Geology Manager
BSc (Hons). MAusIMM (No 302309);
MAIG (No 6471).

Industry experience: He has 25 years' relevant experience and is responsible for the overall accuracy, standard and compliance of this declaration.

N Morriss: Superintendent Mine Planning LoM

BEng (Hons) Mining Engineering;
BCom (Hons) Finance. MAusIMM
(No 208320).

Industry experience: He has 15 years' relevant experience in mining and is responsible for the overall accuracy, standard and compliance of mine planning, schedules and Mineral Reserve estimation, LoM compilation and financial evaluation.

S Gotley: Superintendent Resource Geologist

BSc (Geology); Grad. Cert.
Geostatistics MAusIMM (No 211515);
AIG (No 2780).

Industry experience: With 25 years' relevant experience, she is responsible for Mineral Resource estimation and reporting.

Australia region

Granny Smith

P Johansen: Geology Manager
BSc (Hons) Geology. AusIMM
(No 108674).

Industry experience: With 29 years' relevant experience, he is responsible for the overall accuracy, standard and compliance of this declaration.

M Knedler: Senior Engineer: Mining

BSc Mining. MAusIMM (No 223141).

Industry experience: He has 10 years' relevant experience and he is responsible for the overall accuracy, standard and compliance of mine planning, schedules and Mineral Reserve estimation, LoM compilation and financial evaluation.

R Tully: Superintendent: Resources

BSc (Hons). MAusIMM No 992513);
AIG (No 2716).

Industry experience: With 15 years' relevant experience, he is responsible for Mineral Resource estimation and reporting.

Australia region

St Ives

G Sparks: Geology Manager
BAppSc; MSc. MAusIMM
(No 108663); GSA (No 5823).

Industry experience: He has 33 years' relevant experience and he is responsible for the overall accuracy, standard and compliance of this declaration, and is also responsible for all surface exploration and Mineral Resource development drilling with oversight of exploration geology models.

M Humphreys: Resources Geology Superintendent

BSc (Hons); MSCST (Statistics).
MAusIMM (No 112703).

Industry experience: He has 22 years' mining industry experience and is responsible for the oversight and development of technical standards/auditing and validation for the site-wide Mineral Resource estimation processes and models.

L Grimbeek: Mine Geology Manager

BSc (Hons), Pr Sci Nat (400086/92)

Industry experience: He has 32 years' relevant experience and is responsible for the mine geology processes, exploration and short- to medium-term Mineral Resource development function.

F Phillips: Technical Manager

BEng (Hons) Mining. MAusIMM
(No 1125384).

Industry experience: She has 21 years' relevant experience and is responsible for the overall accuracy, standard and compliance of mine planning, schedules and Mineral Reserve estimation, LoM compilation and financial evaluation.

S Ellery: Resource Evaluation Superintendent

BSc (Hons); MSc Geology; Grad Dip Applied Finance and Investment (SIA). MAusIMM (No 110420).

Industry experience: He has 29 years' relevant experience and is responsible for the compilation of planning assumptions and the compilation of reported Mineral Resource and Mineral Reserve estimates.

Australia region**Gruyere****H Cierlitz: Mine Geology Manager – Gruyere JV**

BAppSc Geology. MAusIMM (No 109073); MAIG (No 5892).

Industry experience: He has 31 years' relevant experience and he is the lead Competent Person and is responsible for the overall accuracy, standard and compliance of the declaration.

D Worthy: Manager Mining – Gruyere JV

BEng Mining. MAusIMM (No 208354).

Industry experience: He has 18 years' relevant mining experience and he is responsible for reviewing and compiling the Mineral Resource and the Ore Reserve estimates.

M Roux: Resources Superintendent – GFA

BSc (Hons); Post Grad Cert (Geostatistics). MAusIMM (No 324099); Pr Sci Nat (400136/09).

Industry experience: He has 18 years' relevant experience and he is responsible for the production, review and technical development of all Mineral Resource processes and models for the Gruyere JV.

R Rakhsha: Senior Mining Engineer

BSc Mining. MAusIMM (No 990476).

Industry experience: He has 20 years of mining experience and he is responsible for determining and reviewing the Mineral Resource and Ore Reserve open pit mine design estimates.

Australia region**FSE****A Trueman: Lead Competent Person and Chief Resource Geologist**

BSc (Hons) Geology; PGeo. APEGBC 149753; MAusIMM CP (Geo) No 110730.

Industry experience: He has geology and resource estimation experience spanning 26 years and is responsible for the overall accuracy, standard and compliance of this declaration.

South Africa region**South Deep****MI Botha: Regional Mining Engineer**

BEng Mining Engineering; BEng (Hons) Technology Management; Mine Managers Certificate (metal). SAIMM (No 706926).

Industry experience: He has 22 years' experience in the mining industry and is responsible for co-ordinating oversight on the mine design and scheduling.

R Pillaye: Chief Geologist

BSc (Hons) Geology. SACNASP (No 400247/08).

Industry experience: He has 27 years' experience in the mining industry and is responsible for production geology at South Deep.

D Kock: Chief Resource Geologist

BSc (Hons) Geology. SACNASP (No 400166/07).

Industry experience: He has nine years' experience in the mining industry and is responsible for resource geology and estimation at South Deep.

A Miller: Chief Surveyor

ND (Mine Survey); Mine Survey Certificate of Competency. PLATO (No PMS 0191).

Industry experience: He has 37 years' experience in the mining industry and is responsible for surveying, reporting and historical modifying factors at South Deep.

Ghana region**R Downing: Regional Manager Geology**

BSc (Hons) (Geology and Environment); GDE: Mining Engineering. MAusIMM (No 229889).

Industry experience: He has 39 years' relevant experience and is the lead Competent Person for the West Africa region, jointly responsible for the overall correctness, standard and compliance of this declaration.

J Nyan: Regional Strategic Mine Planning Manager

MSc. (Mining Engineering). MAusIMM (No 305323).

Industry experience: He has 19 years' relevant experience and is jointly responsible for the overall correctness, standard and compliance of the LoM planning, scheduling, Reserve statement and economic assurance for the West Africa region.

J Searra: Chief Resource Geologist – Development

BSc (Hons) Geology; MSc (Engineering). MAusIMM (No 322681).

Industry experience: He has over 33 years' experience in the mining industry and is responsible for sampling, geology, exploration and resource estimation for Tarkwa.

Competent persons continued

Regional and operational Competent Persons continued

Ghana region

Damang

M.N Biddulph: *Geology Manager*

BA; BSc (Hons) Geology and GIS.
GDE: Mining Engineering; PrSciNat
(No 400007/04).

Industry experience: He has 23 years' relevant experience and is jointly responsible as the CP for the overall correctness, standard and compliance of the Mine Resource Models and the Resource Statement and the mine CPR.

K Appau: *Unit Manager – Strategic Mine Planning*

MSc (Mining Engineering). MAusIMM
(No 316308).

Industry experience: He has 11 years' relevant experience and he is responsible for the overall accuracy of mine planning, optimisation, scheduling and Mineral Reserve estimation.

T Kwesi Abakah: *Unit Manager – Geostatistics and Resource Modelling*

BSc (Hons) Geological Engineering.
MAusIMM (No 316516).

Industry experience: He has 12 years' relevant experience and is responsible for the compilation of this declaration.

Tarkwa

G Avane: *Geology Manager*

MSc (Hons) Geological Engineering.
MAusIMM (No 309400).

Industry experience: He has over 23 years' relevant experience and is the lead Competent Person, responsible for overall Mineral Resource Management for Tarkwa and the overall correctness, standard and compliance of this declaration.

M Aboagye: *Unit Manager – Resource Evaluation*

BSc (Hons) Geological Engineering.
MSc (Mineral Engineering). MAusIMM
(No 322689).

Industry experience: He has over 14 years' experience in the mining industry and is responsible for sampling, geology, exploration and resource estimation for Tarkwa.

P Empeh: *Unit Manager – Strategic Mine Planning*

BSc (Hons) Mining. MAusIMM
(No 226250).

Industry experience: He has 10 years' experience in the mining industry and he is responsible for the overall accuracy of mine planning, scheduling and Mineral Reserve estimation.

Conversion table

Metric	Imperial	Imperial	Metric
1 centimetre	0.3937 inches	1 inch	2.54 centimetres
1 metre	3.28084 feet	1 foot	0.3047972654 metres
1 kilometre	0.62150 miles	1 mile	1.609 kilometres
1 gram	0.03215 troy ounces	1 troy ounce	31.1035 grams
1 gram/tonne	0.0292 ounce/tonne	1 ounce/tonne	34.286 grams/tonne
1 kilogram	2.20458 pounds	1 pound	0.4536 kilograms
1 tonne	1.10229 short tonnes	1 short tonne	0.9072 tonnes
1 hectare	2.47097 acres	1 acre	0.4047 hectares

Abbreviations

3D	three-dimensional
Ag	silver
AIC	All-in costs
AISC	All-in sustaining costs
amsl	above mean sea level – and may be used for heights specified in any units
A\$	Australian dollar
A\$/oz	Australian dollar per ounce
Au	gold
BI	Business Improvement
BSC	Balanced Scorecard
CIL	Carbon in Leach
CIP	Carbon in Pulp
cm	centimetres
CM	Current Mine
COG	cut-off grade
CP	Competent Person
Cu	copper
DD	diamond drill
DFS	Definitive feasibility study
DMR	Department of Mineral Resources
E&P	Engineers and Planners Company Limited
EIA	Environmental Impact Assessment
EMP	Environmental Management Plan
EPA	Environmental Protection Agency
FCF	Free cash-flow
FS	Feasibility study
FSE	Far Southeast Project
Ga	billion years
GC	grade control
g	grams
g/t	grams per ton
GFA	Gold Fields Australia
GFG	Gold Fields Ghana
GFI	Gold Fields Limited
GFLC	Gold Fields La Cima
GJV	Gruyere joint venture
GTC	Grade Tonnage Curve
ha	hectare
HL	Heap Leach
HME	Heavy mining equipment
I&T	Innovation and technology
IAR	Integrated Annual Report
ICMC	International Cyanide Management Code
ICMC	International Cyanide Management Institute
JORC	Australian Code for Reporting Exploration Results, Mineral Resources and Ore Reserves
JSE	Johannesburg Stock Exchange
JV	joint venture

kg	kilogram
km	kilometre
koz	thousand ounces
KPIs	key performance indicators
kt	thousand tonnes
LDIFR	Lost Day Injury Frequency Rate
LEX JV	Lefroy Exploration JV
LoM	life-of-mine
m	metre
m²	square metre
m³	cubic metres
MCF	Mine Call Factor
Mlb	million pounds
Mo	molybdenum
Moz	million ounces
MSO	Mineable Shape Optimiser
Mt	million tonnes
mtpa	million tonnes per annum
NoW	North of Wrench area, directly south of Current Mine, comprises six mining corridors separated by regional pillars that extend southwards to the Wrench fault
NPV	net present value
NSR	net smelter return
oz	ounces (troy)
PFS	Pre-feasibility study
PL	Prospecting Lease
RC	reverse circulation
RoM	run-of-mine (with reference to grade or tonnes)
SACNASP	South African Council for Natural Scientific Professions
SAG	Semi Autogenous Grind
SAMREC Code	South African Code for the Reporting of Exploration Results, Mineral Resources and Mineral Reserves
SEC	United States Securities and Exchange Commission
SoW	South of Wrench, East and West, situated south of NoW
t	metric tonnes
TSF	tailings storage facility
U₃O₈	uranium oxide
US\$	United States dollar
US\$/oz	American dollar per ounce
VCR	Ventersdorp Contact Reef
WA	Western Areas Gold Mining Company Limited
WSF	waste storage facility
ZAR	South African rand
~	Circa, about or approximately

Glossary of terms

	Definition
Auger drill	An auger drilled hole uses a rotating screw blade acting as a screw conveyor to remove the drilled material out of the hole.
Block width	The average width at which it is estimated a block of ore will be mined.
Clastic	Pertaining to a rock or sediment composed principally of broken fragments that are derived from pre-existing rocks or minerals by the processes of weathering and erosion, and have been transported some distance from their place of origin.
Cut-off grade	The lowest grade of mineralised rock which determines as to whether or not it is economic to recover its gold content by further concentration.
Diamond drill	Diamond drilling uses a diamond encrusted drill bit to drill through the rock and recovers a solid core, for examination on the surface.
Dilution	Waste or material below the cut-off grade that contaminates the ore during the process of mining operations and thereby reduces the average grade mined.
Destress	By mining a 2m slice through the package in an optimal position to ensure a destressed window of 50m to 60m above or below the associated stope.
Gold equivalent ounces	A quantity of metal (such as copper) converted to an amount of gold in ounces, based on accepted gold and other metal prices, i.e. the accepted total value of the metal based on its weight and value thereof divided by the accepted value of one troy ounce of gold.
Indicated Mineral Resource	That part of a Mineral Resource for which tonnage, densities, shape, physical characteristics, grade and mineral content can be estimated with a reasonable level of confidence. It is based on information from exploration, sampling and testing of material gathered from locations such as outcrops, trenches, pits, workings and drill holes. The locations are too widely or inappropriately spaced to confirm geological and/or grade continuity but are spaced closely enough for continuity to be assumed.
Inferred Mineral Resource	That part of a Mineral Resource for which tonnage, grade and mineral content can be estimated with a low level of confidence. It is inferred from geological evidence and sampling and assumed, but not verified geologically or through analysis of grade continuity. It is based on information gathered through appropriate techniques from locations such as outcrops, trenches, pits, workings and drill holes that may be limited or of uncertain quality and reliability.
Intracratonic basin	Refers to a basin on top of a craton, which is part of the earth's crust that has attained stability and has been little deformed for a prolonged period.
Kriging efficiency (KE)	Provides a measure of the reliability of block evaluations.
Lacustrine	Produced by or formed within a lake or lake environment.
Life-of-mine (LoM)	Number of years that an operation is planning to mine and treat Proved and Probable Reserves, based on the current mining plan. Year one of this plan is referred to as the Operational Plan.
Littoral	Pertaining to the zone between the highest and lowest levels of spring tides known as the fore-beach.
Measured Mineral Resource	That part of a Mineral Resource for which tonnage, densities, shape, physical characteristics, grade and mineral content can be estimated with a high level of confidence. It is based on detailed and reliable information from exploration, sampling and testing of material from locations such as outcrops, trenches, pits, workings and drill holes. The locations are spaced closely enough to confirm geological and grade continuity.
Mine Call Factor	The ratio expressed as a percentage, which the specific product accounted for in "recovery plus residue" bears to the corresponding product "called for" by the mine's measuring and evaluation methods.

Mineral Reserve	The economically mineable material derived from a Measured and/or Indicated Mineral Resource. It is inclusive of diluting and contaminating materials and allows for losses that are expected to occur when the material is mined. Appropriate assessments to a minimum of a pre-feasibility study for a project and an LoM plan for an operation must have been completed, including consideration of and modification by realistically assumed mining, metallurgical, economic, marketing, legal, environmental, social and governmental factors (the modifying factors). Such modifying factors must be disclosed.
Mineral Resource	A concentration or occurrence of material of economic interest in or on the earth's crust in such form, quality and quantity that there are reasonable and realistic prospects for eventual economic extraction. The location, quantity, grade, continuity and other geological characteristics of a Mineral Resource are known, or estimated from specific geological evidence, sampling and knowledge interpreted from an appropriately constrained and portrayed geological model. Mineral Resources are subdivided, and must be so reported, in order of increasing confidence in respect of geoscientific evidence into Inferred, Indicated and Measured categories.
Net Smelter Return (NSR)	This is defined as the return from sales of concentrates expressed in US\$/tonne, i.e.: $NSR = (Au \text{ price} - Au \text{ selling costs}) \times Au \text{ grade} \times Au \text{ recovery} + (Cu \text{ price} - Cu \text{ selling price}) \times Cu \text{ grade} \times Cu \text{ recovery}$.
Operational Plan	Year one of the LoM plan.
Pay limit	The value at which it is estimated that ore can be mined at break-even.
Peneplain	A low, nearly featureless, gently undulating land surface of considerable area, which has been produced by the processes of long continued sub-aerial erosion.
Plant Recovery Factor	The ratio, expressed as a percentage, of the mass of the specific mineral product actually recovered from ore treated at the plant to its total specific mineral content before treatment.
Probable Mineral Reserve	Economically mineable material derived from a Measured or Indicated Mineral Resource or both. It is estimated with a lower level of confidence than a Proved Mineral Reserve. It includes diluting and contaminating materials and allows for losses that are expected to occur when the material is mined. Appropriate assessments to a minimum of a pre-feasibility study for a project or an LoM plan for an operation must have been carried out, including consideration of and modification by realistic assumed mining, metallurgical, economic, marketing, legal, environmental, social and governmental factors. Such modifying factors must be disclosed.
Proved Mineral Reserve	Economically mineable material derived from a Measured Mineral Resource. It is estimated with a high level of confidence. It includes diluting and contaminating materials and allows for losses that are expected to occur when the material is mined. Appropriate assessments to a minimum of a pre-feasibility study for a project or an LoM plan for an operation must have been carried out, including consideration of and modification by realistic assumed mining, metallurgical, economic, marketing, legal, environmental, social and governmental factors. Such modifying factors must be disclosed.
Regolith	A layer of loose unconsolidated rock that lies above a layer of bedrock.
Strategic Plan	The Strategic Plan (SP) for each asset is guided by the strategic planning framework that selects the preferred strategy for each asset based on alignment with the Group Strategic metrics (AIC/oz, NPV, FCF% margin, gold and life) and consideration for capital allocation, innovation and technology, and opportunity and risk. The SP provides the framework for the subsequent Business and LoM planning phases undertaken annually.
tonnage discrepancy	Difference between the tonnage hoisted as ore and that accounted for by the plant measuring methods. Discrepancy is referred to as a shortfall when the calculated tonnage is less than the tonnage accounted for by the plant, or an excess when the opposite occurs.
Tonne(s)	Metric ton (tonnes) = 1,000 kilograms.
Uraninite	A strongly radioactive, brownish-black mineral, (UO ₂), forming the chief ore of uranium (U ₃ O ₈) and containing variable amounts of radium, lead, thorium and other elements as impurities
Witwatersrand Basin	A sedimentary basin in South Africa that contains close to a 6,000m thick sequence of principally argillaceous and arenaceous sediments with inter-bedded conglomerates.

Forward looking statement

This report contains forward looking statements within the meaning of section 27A of the U.S. Securities Act of 1933, as amended, or the Securities Act, and section 21E of the U.S. Securities Exchange Act of 1934, as amended, or the Exchange Act, with respect to Gold Fields' financial condition, results of operations, business strategies, operating efficiencies, competitive position, growth opportunities for existing services, plans and objectives of management, markets for stock and other matters. Refer to the full forward looking statements on www.goldfields.com/disclaimer.php



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