As filed with the Securities and Exchange Commission on October 26, 2016

UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, D.C. 20549

FORM 20-F

(Mark One)

☐ **REGISTRATION STATEMENT PURSUANT TO SECTION 12(b) OR (g) OF THE SECURITIES EXCHANGE ACT OF 1934**

OR

☒ **ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

For the fiscal year ended June 30, 2016

OR

☐ **TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

OR

☐ **SHELL COMPANY REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

Date of event requiring this shell company report ________

For the transition period from ________ to ________

Commission file number: 001 — 31545

HARMONY GOLD MINING COMPANY LIMITED

(Exact name of registrant as specified in its charter)

REPUBLIC OF SOUTH AFRICA

(Jurisdiction of incorporation or organization)

RANDFONTEIN OFFICE PARK, CNR WARD AVENUE AND MAIN REEF ROAD,
RANDFONTEIN, SOUTH AFRICA, 1759

(Address of principal executive offices)

Riana Bisschoff, Group Company Secretary
Tel: +27 11 411 6020, riana.bisschoff@harmony.co.za, fax: +27 (0) 11 696 9734,
Randfontein Office Park, CNR Ward Avenue and Main Reef Road, Randfontein, South Africa, 1759
(Name, Telephone, E-mail and/or Facsimile number and Address of Company Contact Person)

Securities registered or to be registered pursuant to Section 12(b) of the Act:

Ordinary shares, with nominal value Rand 50 cents per share*

(Title of Class)

American Depositary Shares (as evidenced by American Depositary Receipts),
each representing one ordinary share

(Title of Class)

* Not for trading, but only in connection with the registration of American Depositary Shares, pursuant to the requirements of the Securities and Exchange Commission.

Securities registered or to be registered pursuant to Section 12(g) of the Act:

None

Securities for which there is a reporting obligation pursuant to Section 15(d) of the Act:

None

The number of outstanding shares of each of the issuer's classes of capital or common stock as of the close of the last full fiscal year covered by this Annual Report was 437,299,479 ordinary shares, with nominal value of Rand 50 cents per share

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Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act. YES ☒ NO ☐

If this report is an annual or transition report, indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934. YES ☐ NO ☒

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports) and (2) has been subject to such filing requirements for the past 90 days. YES ☒ NO ☐

Indicate by check mark whether the registrant has submitted electronically and posted on its corporate Web site, if any, every Interactive Data File required to be submitted and posted pursuant to Rule 405 of Regulation S-T during the preceding 12 months (or for such shorter period that the registrant was required to submit and post such files)**. YES ☐ NO ☐

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, or a non-accelerated filer. See definition of "accelerated filer and large accelerated filer" in Rule 12b-2 of the Exchange Act. (Check one):

Large accelerated filer ☐ Accelerated filer ☒ Non-accelerated filer ☐ Smaller reporting company ☐

Indicate by check mark which basis of accounting the registrant has used to prepare the financial statements included in this filing:

US GAAP ☐ International Financial Reporting Standards as issued by the International Accounting Standards Board ☒ Other ☐

If "Other" has been checked in response to the previous question, indicate by check mark which financial statement item the registrant has elected to follow**:

Item 17 ☐ Item 18 ☐

If this is an annual report, indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act).

YES ☐ NO ☒

Indicate by check mark whether the registrant has filed all documents and reports required to be filed by Sections 12, 13 or 15(d) of the Securities Exchange Act of 1934 subsequent to the distribution of securities under a plan confirmed by a court**.

YES ☐ NO ☐

**Not applicable to the registrant

TABLE OF CONTENTS

This document comprises the annual report on Form 20-F for the year ended June 30, 2016 ("**Harmony 2016 Form 20-F**") of Harmony Gold Mining Company Limited ("**Harmony**" or the "**Company**"). Certain of the information in the Harmony Integrated Annual Report 2016 included in Exhibit 15.1 ("**Integrated Annual Report for the 20-F 2016**") is incorporated by reference into the Harmony 2016 Form 20-F, as specified elsewhere in this report, in accordance with Rule 12b-23(a) of the Securities Exchange Act of 1934, as amended (the "**Exchange Act**"). With the exception of the items so specified, the Integrated Annual Report for the 20-F 2016 is not deemed to be filed as part of the Harmony 2016 Form 20-F.

Only (i) the information included in the Harmony 2016 Form 20-F, (ii) the information in the Integrated Annual Report for the 20-F 2016 that is expressly incorporated by reference in the Harmony 2016 Form 20-F and (iii) the exhibits to the Harmony 2016 Form 20-F that are required to be filed pursuant to the Form 20-F (the "**Exhibits**"), shall be deemed to be filed with the Securities and Exchange Commission ("**SEC**") for any purpose. Any information in the Integrated Annual Report for the 20-F 2016 which is not referenced in the Harmony 2016 Form 20-F or filed as an Exhibit, shall not be deemed to be so incorporated by reference.

Financial and other material information regarding Harmony is routinely posted on and accessible at the Harmony website, *www.harmony.co.za*. References in the Harmony 2016 Form 20-F and the Exhibits to the Harmony website, unless otherwise expressly stated, are not incorporated by reference into this document.

USE OF TERMS AND CONVENTIONS IN THIS ANNUAL REPORT

Harmony Gold Mining Company Limited is a corporation organized under the laws of the Republic of South Africa. As used in this Annual Report on Form 20-F ("**Harmony 2016 Form 20-F**"), unless the context otherwise requires, the terms "**Harmony**" and "**Company**" refer to Harmony Gold Mining Company Limited; the term "**South Africa**" refers to the Republic of South Africa; the terms "**we**", "**us**" and "**our**" refer to Harmony and, as applicable, its direct and indirect subsidiaries as a "**Group**".

In this annual report, references to "**R**", "**Rand**" and "**c**", "**cents**" are to the South African Rand, the lawful currency of South Africa, "**A$**" and "Australian dollars" refers to Australian dollars, "**K**" or "**Kina**" refers to Papua New Guinean Kina and references to "**$**", "**US$**" and "**US dollars**" are to United States dollars.

This annual report contains information concerning our gold reserves. While this annual report has been prepared in accordance with the regulations contained in the SEC's Industry Guide 7, it is based on assumptions which may prove to be incorrect. See Item 3: *"Key Information—Risk Factors—Estimations of Harmony's gold reserves are based on a number of assumptions, including mining and recovery factors, future cash costs of production and the price of gold. As a result, quantities of gold produced may differ from current estimates."*

This annual report contains descriptions of gold mining and the gold mining industry, including descriptions of geological formations and mining processes. We have explained some of these terms in the Glossary of Mining Terms included in this annual report. This glossary may assist you in understanding these terms.

PRESENTATION OF FINANCIAL INFORMATION

We are a South African company and the majority of our operations are located in our home country. Accordingly, our books of account are maintained in South African Rand and our annual and interim financial statements are prepared in accordance with International Financial Reporting Standards as issued by the International Accounting Standards Board ("**IFRS**"). This annual report includes our consolidated financial statements prepared in accordance with IFRS, translated into US dollars. All financial information, except as otherwise noted, is stated in accordance with IFRS.

In this annual report, we also present "cash costs", "cash costs per ounce", "all-in sustaining costs" and "all-in sustaining costs per ounce", which are non-GAAP measures. An investor should not consider these items in isolation or as alternatives to production costs, cost of sales or any other measure of financial performance presented in accordance with IFRS. The calculation of cash costs, cash costs per ounce, all-in sustaining costs and all-in sustaining costs per ounce may vary significantly among gold mining companies and, by themselves, do not necessarily provide a basis for comparison with other gold mining companies. For further information, see Item 5: *"Operating and Financial Review and Prospects—Costs—Reconciliation of Non-GAAP Measures"*.

We have included the US dollar equivalent amounts of certain information and transactions in Rand, Kina and A$. Unless otherwise stated, we have translated: (i) assets and liabilities at the closing rate as reported by Reuters on the last business day of the period (R14.72 per US$1.00 as at June 30, 2016 and R12.16 per US$1.00 as at June 30, 2015), (ii) acquisitions, disposals and specific items such as impairments at the rate prevailing at the dates applicable to such transactions (iii) income statement items at the average rate for the year (R14.50 per US$1.00 for fiscal 2016, R11.45 per US$1.00 for fiscal 2015 and R10.35 per US$1.00 for fiscal 2014) and (iv) equity items are translated at historic rates. Profit from discontinued operations in fiscal 2013 is translated from Rand to US dollars at the average exchange rate for the eight month period (R8.55 per US$1.00 for the period July 1, 2012 to February 28, 2013). Capital expenditures for fiscal 2017 have been translated at an exchange rate of R14.00 per US$1.00. By including these US dollar equivalents in this annual report, we are not representing that the Rand, Kina and A$ amounts actually represent the US dollar amounts, as the case may be, or that these amounts could be converted at the rates indicated. For further information, see Item 3:*"Key Information—Selected Financial Data—Exchange Rates"*.

CAUTIONARY STATEMENT ABOUT FORWARD-LOOKING STATEMENTS

This annual report contains forward-looking statements within the meaning of the safe harbor provided by Section 21E of the Exchange Act and Section 27A of the Securities Act of 1933, as amended (the "**Securities Act**"), with respect to our financial condition, results of operations, business strategies, operating efficiencies, competitive positions, growth opportunities for existing services, plans and objectives of management, markets for stock and other matters. These include all statements other than statements of historical fact, including, without limitation, any statements preceded by, followed by, or that include the words "targets", "believes", "expects", "aims", "intends", "will", "may", "anticipates", "would", "should", "could", "estimates", "forecast", "predict", "continue" or similar expressions or the negative thereof.

These forward-looking statements, including, among others, those relating to our future business prospects, revenues and income, wherever they may occur in this annual report and the exhibits to this annual report, are necessarily estimates reflecting the best judgment of our senior management and involve a number of risks and uncertainties that could cause actual results to differ materially from those suggested by the forward-looking statements. As a consequence, these forward-looking statements should be considered in light of various important factors, including those set forth in this annual report. Important factors that could cause actual results to differ materially from estimates or projections contained in the forward-looking statements include, without limitation:

- overall economic and business conditions in South Africa, Papua New Guinea, Australia and elsewhere;
- estimates of future earnings, and the sensitivity of earnings to the gold and other metals prices;
- estimates of future gold and other metals production and sales;
- estimates of future cash costs;
- estimates of future cash flows, and the sensitivity of cash flows to the gold and other metals prices;
- statements regarding future debt repayments;
- estimates of future capital expenditures;
- the success of our business strategy, development activities and other initiatives;
- estimates of reserves statements regarding future exploration results and the replacement of reserves;
- the ability to achieve anticipated efficiencies and other cost savings in connection with past and future acquisitions;
- fluctuations in the market price of gold;
- the occurrence of hazards associated with underground and surface gold mining;
- the occurrence of labor disruptions;
- power cost increases as well as power stoppages, fluctuations and usage constraints;
- supply chain shortages and increases in the prices of production imports and the availability, terms and deployment of capital;
- changes in government regulation, particularly mining rights and environmental regulation;
- fluctuations in exchange rates;
- the adequacy of the Group's insurance coverage;
- socio-economic or political instability in South Africa, Papua New Guinea, Australia and other countries in which we operate.

We undertake no obligation to update publicly or release any revisions to these forward-looking statements to reflect events or circumstances after the date of this annual report or to reflect the occurrence of unanticipated events, except as required by law.

PART I

ITEM 1. IDENTITY OF DIRECTORS, SENIOR MANAGEMENT AND ADVISERS

Not applicable.

ITEM 2. OFFER STATISTICS AND EXPECTED TIMETABLE

Not applicable.

ITEM 3. KEY INFORMATION

A. SELECTED FINANCIAL DATA

The selected consolidated financial data below should be read in conjunction with, and are qualified in their entirety by reference to, our consolidated financial statements, and the notes thereto, set forth beginning on page F-1, and with Item 3: "Key Information—Risk Factors" and Item 5: "Operating and Financial Review and Prospects". Historical results are not necessarily indicative of results to be expected for any future period.

Selected Historical Consolidated Financial Data

We are a South African company and the majority of our operations are located in our home country. Accordingly, our books of account are maintained in South African Rand and our annual and interim financial statements are prepared in accordance with IFRS. This annual report includes our consolidated financial statements prepared in accordance with IFRS, translated into US dollars. The selected historical consolidated income statement and balance sheet data for the last five fiscal years are, unless otherwise noted, stated in accordance with IFRS, and has been extracted from the more detailed information and financial statements prepared in accordance with IFRS. The financial data as at June 30, 2016 and 2015 and for each of the years in the three-year period ended June 30, 2016, should be read in conjunction with, and is qualified in its entirety by reference to our audited consolidated financial statements set forth beginning on page F-1. Financial data as at June 30, 2014, 2013 and 2012, and for the years ended June 30, 2013 and 2012 have been derived from our previously published consolidated financial statements, which are not included in this document.

Discontinued operations for the periods below include the Evander operations in South Africa. The assets and liabilities of the Evander operation were classified as held for sale in fiscal 2012 following the signing of a sale of shares and claims agreement with Pan African Resources plc ("**Pan African**"). The results of this operation have been presented as a discontinued operation. The reclassifications in respect of discontinued operations were done in terms of IFRS 5 — Non-Current Assets Held for Sale and Discontinued Operations. The sale of Evander was concluded in fiscal 2013.

	Fiscal year ended June 30,				
	2016	**2015**	**2014**	**2013**	**2012**
	($ in millions, except per share amounts, cash costs per ounce and all-in sustaining costs per ounce)				
Income Statement Data					
Revenue	1,264	1,348	1,515	1,803	1,953
Reversal of impairment/(impairment) of assets	3	(285)	(135)	(274)	7
Operating profit/(loss)	111	(433)	(146)	(193)	271
Profit/(loss) from associates	—	(2)	(10)	—	—
Profit/(loss) from continuing operations before taxation	109	(436)	(145)	(191)	245
Taxation	(43)	62	27	(69)	16
Profit/(loss) from continuing operations	66	(374)	(118)	(260)	261
Profit/(loss) from discontinued operations	—	—	—	36	75
Net profit/(loss)	66	(374)	(118)	(224)	336
Basic (loss)/earnings per share from continuing operations (US cents)	15	(86)	(27)	(60)	60
Diluted earnings/(loss) per share from continuing operations (US cents)	15	(86)	(27)	(60)	60
Basic earnings/(loss) per share (US cents)	15	(86)	(27)	(52)	78
Diluted earnings/(loss) per share (US cents)	15	(86)	(27)	(52)	78
Weighted average number of shares		434,423,747	433,212,423	431,880,814	430,817,682

	Fiscal year ended June 30,				
	2016	2015	2014	2013	2012
	($ in millions, except per share amounts, cash costs per ounce and all-in sustaining costs per ounce)				
used in the computation of basic earnings/(loss) per share	435,738,577				
Weighted average number of shares used in the computation of diluted earnings/(loss) per share	446,398,380	438,091,109	434,715,373	432,716,622	432,022,229
Dividends per share (US cents)[(1)]	—	—	—	12	14
Dividends per share (SA cents)[(1)]	—	—	—	100	100
Other Financial Data					
Cash costs per ounce of gold from continuing operations ($/oz)[(2)]	841	1,003	988	1,146	1,101
Total cash costs per ounce of gold ($/oz)[(2)]	841	1,003	988	1,137	1,086
All-in sustaining costs per ounce of gold from continuing operations ($/oz)[(2)]	1,003	1,231	1,222	1,497	1,423
Balance Sheet Data					
Assets					
Property, plant and equipment	2,033	2,430	3,116	3,279	3,992
Assets of disposal groups classified as held for sale	—	—	—	—	174
Total assets	2,515	2,972	3,852	4,221	5,250
Net assets	1,914	2,200	2,925	3,229	4,139
Equity and liabilities					
Share capital	4,036	4,035	4,035	4,035	4,036
Total equity	1,914	2,200	2,925	3,229	4,139
Borrowings (current and non-current)	159	280	270	254	221
Liabilities of disposal groups held for sale	—	—	—	—	46
Other liabilities	442	492	657	738	844
Total equity and liabilities	2,515	2,972	3,852	4,221	5,250

(1) Dividends per share relates to the dividends recorded and paid during the fiscal year.

(2) Cash costs per ounce and all-in sustaining costs per ounce are non-GAAP measures. Cash costs per ounce and all-in sustaining cost per ounce have been calculated on a consistent basis for all periods presented. The all-in sustaining costs per ounce for fiscal 2012 to 2015 have been restated to exclude share-based payments charge. Changes in cash costs per ounce and all-in sustaining costs per ounce are affected by operational performance, as well as changes in the currency exchange rate between the Rand and the US dollar. Because cash cost per ounce and all-in sustaining costs per ounce are non-GAAP measures, these measures should therefore not be considered by investors in isolation or as an alternative to production costs, cost of sales, or any other measure of financial performance calculated in accordance with IFRS. The calculation of cash costs, cash costs per ounce, all-in sustaining costs and all-in sustaining costs per ounce may vary from company to company and may not be comparable to other similarly titled measures of other companies. For further information, see *Item 5: "Operating and Financial Review and Prospects—Costs—Reconciliation of Non-GAAP measures*".

Exchange Rates

Unless otherwise stated, balance sheet item amounts are translated from Rand to US dollars at the exchange rate prevailing on the last business day of the period (R14.72 per US$1.00 as at June 30, 2016 and R12.16 per US$1.00 as at June 30, 2015), except for acquisitions, disposals and specific items such as impairments that are converted at the exchange rate prevailing on the dates of the transactions. Income statement item amounts that are translated from Rand to US dollars at the average exchange rate for the period (R14.50 per US$1.00 for fiscal 2016, R11.45 per US$1.00 for fiscal 2015 and R10.35 per US$1.00 for fiscal 2014). During fiscal 2016, the Rand/dollar closing exchange rate ranged between R12.24 and R16.87 per US$1.00. Profit from discontinued operations in fiscal 2013 is translated from Rand to US dollars at the average exchange rate for the eight month period (R8.55 per US$1.00 for the period July 1, 2012 to February 28, 2013).

The following table sets forth, for the past five fiscal years, the average and period end rates for Rand expressed in Rand per US$1.00. The exchange rates are sourced from Reuters, being the closing rate at period end.

As of October 19, 2016, the exchange rate per US$1.00 was R13.83[1].

Fiscal Year Ended June 30,	Average[2]	Period End[1]
2012	7.77	8.21
2013	8.82	9.98
2014	10.35	10.61
2015	11.45	12.16
2016	14.50	14.72
Month of	**High**	**Low**
May 2016	15.86	14.26
June 2016	15.89	14.40
July 2016	14.75	13.94
August 2016	14.66	13.27
September 2016	14.59	13.49
October 2016 (through October 19, 2016)	14.36	13.58

(1) Based on the interbank rate as reported by Reuters.
(2) The daily average of the closing rate during the relevant period as reported by Reuters.

Fluctuations in the exchange rate between Rand and the US dollar will affect the dollar equivalent of the price of ordinary shares on the Johannesburg Stock Exchange ("**JSE**"), which may affect the market price of the American Depositary Shares ("**ADSs**") evidenced by American Depositary Receipts ("**ADRs**") on the New York Stock Exchange ("**NYSE**"). These fluctuations will also affect the dollar amounts received by owners of ADSs on the conversion of any dividends on ordinary shares paid in Rand.

B. CAPITALIZATION AND INDEBTEDNESS

Not applicable.

C. REASONS FOR THE OFFER AND USE OF PROCEEDS

Not applicable.

D. RISK FACTORS

In addition to the other information included in this annual report and the exhibits, you should also carefully consider the following factors related to our ordinary shares and ADSs. There may be additional risks that we do not currently know of or that we currently deem immaterial based on information currently available to us. Although Harmony has a formal risk policy framework in place, the maintenance and development of which is undertaken on an ongoing basis so as to help management address systematic categories of risk associated with its business operations, any of these risks could have a material adverse effect on our business, financial condition or results of operations, leading to a decline in the trading price of our ordinary shares or our ADSs. The risks described below may, in retrospect, turn out to be incomplete and therefore may not be the only risks to which we are exposed. Additional risks and uncertainties not presently known to us or that we now believe are immaterial (and have therefore not been included), could also adversely affect our business, results of operations or financial condition. The order of presentation of the risk factors below does not indicate the likelihood of their occurrence or the magnitude or the significance of the individual risks. The risks described below could occur individually or cumulatively and intensify in case of a cumulative occurrence.

Risks Relating to Our Business and the Gold Mining Industry

The profitability of our operations, and cash flows generated by those operations, are affected by changes in the price of gold. A fall in the gold price below our cash cost of production for any sustained period may lead to losses and require Harmony to curtail or suspend certain operations.

Substantially all of Harmony's revenues come from the sale of gold. Historically, the market price for gold has fluctuated widely and been affected by numerous factors, over which Harmony has no control, including:

- demand for gold for industrial uses, jewelry and investment;
- international or regional political and economic events and trends;
- strength or weakness of the US dollar (the currency in which gold prices generally are quoted) and of other currencies;
- monetary policies announced or implemented by central banks, including the US Federal Reserve;
- financial market expectations on the rate of inflation;
- interest rates;
- speculative activities;
- forward sales by gold producers;
- actual or expected purchases and sales of gold bullion held by central banks or other large gold bullion holders or dealers; and
- production and cost levels for gold in major gold-producing nations, such as South Africa, China, the United States and Australia.

In addition, current demand and supply affects the price of gold, but not necessarily in the same manner as current demand and supply affect the prices of other commodities. Historically, gold has retained its value in relative terms against basic goods in times of inflation and monetary crisis. As a result, central banks, financial institutions and individuals hold large amounts of gold as a store of value and production in any given year constitutes a very small portion of the total potential supply of gold. Since the potential supply of gold is large relative to mine production in any given year, normal variations in current production will not necessarily have a significant effect on the supply of gold or its price. Uncertainty on global economic conditions has impacted the price of gold significantly since fiscal 2013 and continued to do so in fiscal 2015 and in fiscal 2016 and may continue to do so in the future.

The volatility of gold prices is illustrated in the table, which shows the annual high, low and average of the afternoon London bullion market fixing price of gold in US dollars for each of the past ten years:

Annual gold price: 2006 – 2016

	Price per ounce (US$)		
Calendar year	High	Low	Average
2006	725	525	604
2007	841	608	695
2008	1,011	713	872
2009	1,213	810	972
2010	1,421	1,058	1,225
2011	1,895	1,319	1,572
2012	1,792	1,540	1,669
2013	1,694	1,192	1,411
2014	1,385	1,142	1,266
2015	1,296	1,049	1,160
2016 (year to October 19, 2016)	1,366	1,077	1,366

On October 19, 2016, the afternoon fixing price of gold on the London bullion market was US$1,269/oz.

While the aggregate effect of these factors is impossible to predict, if gold prices should fall below Harmony's cash cost of production and capital expenditure required to sustain production and remain at these levels for any sustained period, Harmony may record losses and be forced to curtail or suspend some or all of its operations. In addition, Harmony would also have to assess the economic impact of low gold prices on its ability to recover any losses that may be incurred during that period and on its ability to maintain adequate reserves.

Harmony's average cash costs per ounce of gold produced from continuing operations was US$841 in fiscal 2016, US$1,003 in fiscal 2015 and US$988 in fiscal 2014. Harmony's average all-in sustaining cost per ounce of gold sold was US$1,003 in fiscal 2016, US$1,231 in fiscal 2015 and US$1,222 in fiscal 2014. For further information about the use of Non-GAAP measures, refer to Item 5: *"Operating and Financial Review and Prospects—Costs—Reconciliation of Non-GAAP Measures"*.

Foreign exchange fluctuations could have a material adverse effect on Harmony's operational results and financial condition.

Gold is priced throughout the world in US dollars and, as a result, Harmony's revenue is realized in US dollars, but most of our operating costs are incurred in Rand and other non-US currencies, including the Australian dollar and Kina. The strengthening of the US dollar against the Rand, Australian dollar and Kina lowers operating costs in US dollar terms. From time to time, Harmony may implement currency hedges intended to reduce exposure to changes in the foreign currency exchange. Such hedging strategies may not however be successful, and any of Harmony's unhedged exchange payments will continue to be subject to market fluctuations. Any significant and sustained appreciation of the Rand and other non-US currencies against the dollar will materially reduce Harmony's Rand revenues and overall net income.

As Harmony currently does not enter into forward sales, commodity derivatives or hedging arrangements on its total future gold production, it is exposed to the impact of any significant decreases in the gold price.

As a rule, Harmony sells its gold at the prevailing market price. In fiscal 2016 the Company did not enter into forward sales, commodity derivative or hedging arrangements to establish a price in advance for the sale of future gold production.

Subsequent to June 30, 2016, however, Harmony entered into short term gold forward sale contracts for a total of 432,000 ounces over a period of 24 months. These contracts manage variability of cash flows for approximately 20% of the Group's total production and were concluded at an average gold price of R682,000/kg. Harmony will apply cash flow hedge accounting to these contracts. Such hedging strategies may not, however be successful.

Harmony's remaining unhedged future production may realize the benefit of any short-term increase in the gold price, but is not protected against decreases; if the gold price should decrease significantly, Harmony's revenues may be materially adversely affected.

Global economic conditions could adversely affect the profitability of Harmony's operations.

Harmony's operations and performance depend on global economic conditions. A global economic downturn may have follow-on effects on our business. These could include:

- key suppliers becoming insolvent, resulting in a break-down in the supply chain; or
- the availability of credit being reduced—this may make it more difficult for Harmony to obtain financing for its operations and capital expenditure or make financing more expensive.

Coupled with the volatility of commodity prices as well as the rising trend of input costs, such factors could result in initiatives relating to strategic alignment, portfolio review, restructuring and cost-cutting, temporary or permanent shutdowns and divestments. Further, sudden changes in a life-of-mine plan or the accelerated closure of a mine may result in the recognition of impairments and give rise to the recognition of liabilities that are not anticipated.

In addition, uncertainty on global economic conditions may also increase volatility or negatively impact the market value of Harmony's securities.

A further downgrade of South Africa's credit rating may have an adverse effect on Harmony's ability to secure financing.

The slowing economy, rising debt, escalating labor disputes and the structural challenges facing the mining industry and other sectors have resulted in the downgrading of South Africa's sovereign credit rating to one level above speculative investment grade, or junk. In fiscal 2016, South Africa was downgraded to BBB- with a negative outlook by the Standard & Poor's rating agency. Moody's downgraded South Africa to Baa2 and changed the stable perspective to negative, while Fitch Ratings downgraded South Africa to BBB- with a stable position. Further downgrading of South Africa's credit ratings to junk by any of these agencies may adversely affect the South African mining industry and Harmony's business, operating results and financial condition by making it more difficult to obtain external financing or could result in any such financing being available only at greater cost or on more restrictive terms than might otherwise be available.

Estimations of Harmony's gold reserves are based on a number of assumptions, including mining and recovery factors, future cash costs of production and the price of gold. As a result, quantities of gold produced may differ from current estimates.

The mineral reserve estimates in this annual report are estimates of the mill-delivered quantity and grade of gold in Harmony's deposits and stockpiles. They represent the amount of gold that Harmony believes can be mined, processed and sold at prices sufficient to recover its estimated future cash costs of production, remaining investment and anticipated additional capital expenditures. Harmony's mineral reserves are estimated based on a number of factors, which have been stated in accordance with the South African Code for the Reporting of Exploration Results, Mineral Resources and Mineral Reserves ("**SAMREC Code**") and the Australian Code for the Reporting of Mineral Resources and Mineral Reserves ("**JORC**") and the SEC's Industry Guide 7. Calculations of Harmony's mineral reserves are based on estimates of:

- future cash costs;
- future gold prices; and
- future currency exchange rates.

These factors, which significantly impact mineral reserve estimates, are beyond Harmony's control. As a result, reserve estimates in this annual report should not be interpreted as assurances of the economic life of Harmony's gold and other precious metal deposits or the future profitability of operations.

Since these mineral reserves are estimates based on assumptions related to factors detailed above, should there be changes to these, we may in future need to revise these estimates. In particular, if Harmony's cash operating and production costs increase or the gold price decreases, recovering a portion of Harmony's mineral reserves may become uneconomical. This will lead, in turn, to a reduction in estimated reserves.

Harmony's operations have limited proved and probable reserves, and exploration and discovery are necessary to maintain current gold production levels at these operations. Exploration for gold and other precious metals is speculative in nature, may be unsuccessful and involves many risks.

Risks include those related to:

- locating orebodies;
- geological nature of the orebodies;
- identifying the metallurgical properties of orebodies;
- estimating the economic feasibility of mining orebodies;
- developing appropriate metallurgical processes;
- obtaining necessary governmental permits; and
- constructing mining and processing facilities at any site chosen for mining.

Harmony's exploration efforts might not result in the discovery of mineralization, and any mineralization discovered might not result in an increase in proved and probable reserves. To access additional reserves, Harmony will need to successfully complete development projects, including extensions to existing mines and, possibly, new mines. Development projects would also be required to access any new mineralization discovered by exploration activities around the world. Harmony typically uses feasibility studies to determine whether to undertake significant development projects. Feasibility studies include estimates of expected or anticipated economic returns, which are based on assumptions about:

- future gold and other metal prices;
- anticipated tonnage, grades and metallurgical characteristics of ore to be mined and processed;
- anticipated recovery rates of gold and other metals from the ore; and
- anticipated total costs of the project, including capital expenditure and cash costs.

A failure in our ability to discover new reserves, enhance existing reserves or develop new operations in sufficient quantities to maintain or grow the current level of our reserves could negatively affect our results, financial condition and prospects.

Actual cash costs, capital expenditure, production and economic returns may differ significantly from those anticipated by feasibility studies for new development projects.

It can take a number of years from the initial feasibility study until development is completed and, during that time, the economic feasibility of production may change. In addition, there are a number of inherent uncertainties in developing and constructing an extension to an existing mine or any new mine, including:

- availability and timing of necessary environmental and governmental permits;
- timing and cost of constructing mining and processing facilities, which can be considerable;
- availability and cost of skilled labor, power, water, fuel, mining equipment and other materials;
- accessibility of transportation and other infrastructure, particularly in remote locations;
- availability and cost of smelting and refining arrangements;
- availability of funds to finance construction and development activities; and
- spot and expected future commodity prices of metals including gold, silver, copper, uranium and molybdenum.

Competition with other mining companies and individuals for specialized equipment, components and supplies necessary for exploration and development, for mining claims and leases on exploration properties and for the acquisition of mining assets also impact existing operations and potential new developments. Competitors may have greater financial resources, operational experience and technical capabilities – all which could negatively affect the anticipated costs and economic returns.

Harmony currently maintains a range of focused exploration programs, concentrating mainly on a number of prospective known gold and copper mineralized areas in Papua New Guinea ("**PNG**"). During fiscal 2016, fiscal 2015 and fiscal 2014, the bulk of exploration expenditure was allocated to activities in PNG. However, there is no assurance that any future development projects will extend the life of our existing mining operations or result in any new commercial mining operations.

Costs associated with pumping water inflows from closed mines adjacent to our operations could adversely affect Harmony's operational results.

Certain of our mining operations are adjacent to the mining operations of other companies. A mine closure can affect continued operations at an adjacent mine if appropriate preventative steps are not taken. In particular, this could include the ingress of underground water when pumping operations at the closed mine are suspended. This can result in damage to property, operational disruptions and additional pumping costs, which would adversely affect any one of our adjacent mining operations.

Infrastructure constraints and ageing infrastructure could adversely affect Harmony's operations

Mining, processing, development and exploration activities depend on adequate infrastructure. Reliable rail, ports, roads, bridges, power sources, power transmission facilities and water supply are critical to the Company's business operations and affect capital and operating costs. The infrastructure and services are often provided by third parties whose operational activities are outside the control of the Company.

Once a shaft or a processing plant has reached the end of its intended lifespan, higher than normal maintenance and care is required. Maintaining this infrastructure requires skilled human resources, capital allocation, management and planned maintenance. Although Harmony has implemented a comprehensive maintenance strategy, incidents resulting in production delays, increased costs or industrial accidents may occur. Such incidents may have an adverse effect on Harmony's operating results and financial condition.

Fluctuations in input production prices linked to commodities may adversely affect Harmony's operational results and financial condition.

Fuel, energy and consumables, including diesel, heavy fuel oil, chemical reagents, explosives, tires, steel and mining equipment consumed in mining operations form a relatively large part of the operating costs and capital expenditure of a mining company. Harmony has no control over the costs of these consumables, many of which are linked to some degree to the price of oil and steel.

Fluctuations in oil and steel prices have a significant impact on operating cost and capital expenditure estimates and, in the absence of other economic fluctuations, could result in significant changes in the total expenditure estimates for new mining projects or render certain projects non-viable.

The supply of electricity and increases in the cost of power may adversely affect the results of our operations and our financial condition.

In South Africa, each of our mining operations depends on electrical power generated by the state utility, Eskom, which holds a monopoly in the South African market. As a result of increased demand exceeding available generating capacity, South Africa has been subject to disruptions in electrical power supply. In fiscal 2008, electricity supply was interrupted by Eskom, halting production at certain of our mines. This led to management restructuring operating processes to control and reduce our consumption of electricity at all our operations. During November 2014, Eskom reintroduced a schedule of rolling blackouts, or "load shedding". In 2015, Eskom could not guarantee that there would be no power interruptions and we again faced very tight supply reserve margins. Load shedding events have, however, stabilized in 2016 and electricity supply from Eskom is expected to remain stable in the near future, largely as a result of the demand for electricity dropping as a result of market conditions. Should the implementation of load shedding resume, however, the reduced supply of electricity may affect our operational results and financial condition.

As a result of Eskom's planned capital expansion program to deal with power constraints, an average annual tariff increase of 8% for the five-year multi-year price determination period has been approved by the National Energy Regulator of South Africa ("**NERSA**"). The first increase was implemented on April 1, 2013. On March, 1, 2016, NERSA granted Eskom a tariff increase of 9.4% in respect of the average tariff for standard tariff customers for the 2016/2017 financial year. On August 16, 2016, however, the Gauteng Division, Pretoria, of the High Court set aside NERSA's decision to grant Eskom the tariff increase of 9.4% for the 2016/2017 financial year on the grounds that NERSA's multi-year price determination methodology had not been properly applied. During September 2016, NERSA and ESKOM each delivered an application to the Gauteng Division, Pretoria, of the High Court for leave to appeal the judgment. Although Eskom has implemented the tariff increase following the delivery of its application for leave to appeal, it is uncertain as to what tariff will apply following the outcome of the application for leave to appeal or subsequent appeal. There can be no assurance as to the existence or nature of any government intervention with respect to tariff increases in the future.

In November 2015, a draft Carbon Tax Bill was published for public consultation – the draft bill anticipates that the carbon tax will be implemented on January 1, 2017. At this time it is not possible to determine the ultimate impact of the proposed carbon tax on the company. Energy is a significant input to our mining and processing operations, with our principal energy sources being electricity and it is likely that the proposed carbon tax will affect our operations. In order both to facilitate the carbon tax legal regime and to provide for greater regulation of greenhouse gas ("**GHG**") emissions outside of the carbon tax, the Department of Environmental Affairs has initiated the implementation of a mandatory GHG reporting system, for certain identified data providers.

PNG has limited power generation and distribution capacity. This capacity is increasing but, currently, Harmony mines and projects still partially rely on our own diesel-generated power. The cost of this power will fluctuate with changes in the oil price.

Also, see Item 5: *"Operating and Financial Review and Prospects—Electricity in South Africa."* and *"Integrated Annual Report for the 20-F 2016—Harmony in Action—Environmental performance"* on pages 59 to 77.

We may experience problems in identifying, financing and managing new acquisitions and integrating them with our existing operations.

Acquiring new gold mining operations involves a number of risks including:

- our ability to identify appropriate assets for acquisition and/or to negotiate acquisitions on favorable terms;
- obtaining the financing necessary to complete future acquisitions;
- difficulties in assimilating the operations of the acquired business;
- difficulties in maintaining our financial and strategic focus while integrating the acquired business;
- problems in implementing uniform standards, controls, procedures and policies;
- increasing pressures on existing management to oversee a rapidly expanding company; and
- to the extent we acquire mining operations outside other than in South Africa, Australia or PNG, encountering difficulties relating to operating in countries in which we have not previously operated.

Our ability to make successful acquisitions and any difficulties or time delays in achieving successful integration of any of such acquisitions could have a material adverse effect on our business, operating results, financial condition and share price.

Certain factors may affect our ability to support the carrying value of our property, plant and equipment, goodwill and other assets on our balance sheet.

Harmony reviews and tests the carrying value of its assets when events or changes in circumstances suggest that this amount may not be recoverable.

At least on an annual basis for goodwill, and when there are indications that impairment of property, plant and equipment and other assets may have occurred, estimates of expected future cash flows for each group of assets are prepared in order to determine the recoverable amounts of each group of assets. These estimates are prepared at the lowest level at which identifiable cash flows are considered as being independent of the cash flows of other mining assets and liabilities. Expected future cash flows are inherently uncertain, and could materially change over time. Such cash flows are significantly affected by reserve and production estimates, together with economic factors such as spot and forward gold prices, discount rates, currency exchange rates, estimates of costs to produce reserves and future capital expenditures.

As at June 30, 2016, Harmony had substantial amounts of property, plant and equipment, goodwill and other assets on its consolidated balance sheets. Impairment charges relating to property, plant and equipment and other assets were recorded in fiscal 2016 and if any one or a combination of these uncertainties should occur, management may be required to recognize further impairment charges, which could affect Harmony's financial results and condition. See Item 5: *"Operating and Financial Review and Prospects—Critical Accounting Estimates—Impairment of Property, Plant and Equipment"* and "*—Carrying Value of Goodwill."*

Given the nature of mining and the type of gold mines we operate, we face a material risk of liability, delays and increased cash costs of production from environmental and industrial accidents and pollution.

The business of gold mining involves significant risks and hazards, including environmental hazards and industrial accidents. In particular, hazards associated with underground mining include:

- rock bursts;
- seismic events;
- underground fires;
- cave-ins or fall-of-ground;
- discharges of gases and toxic chemicals;
- release of radioactive hazards;
- flooding;
- mining of pillars (integrity of shaft support structures may be compromised and cause increased seismicity);
- processing plant fire and explosion;
- critical equipment failures;
- accidents and fatalities; and
- other conditions resulting from drilling, blasting and the removal and processing of material from a deep-level mine.

Hazards associated with opencast mining (also known as open-pit mining) include:

- flooding of the open-pit;
- collapse of open-pit walls or slope failures;
- processing plant fire and explosion;
- accidents associated with operating large open-pit and rock transportation equipment; and
- accidents associated with preparing and igniting of large-scale open-pit blasting operations.

Hazards associated with waste-rock mining include:

- accidents associated with operating a waste dump and rock transportation;
- production disruptions caused by weather;
- processing plant fire and explosion; and
- critical equipment failures.

We are at risk from any or all of these environmental and industrial hazards. The occurrence of any of these hazards could delay production, increase cash costs and result in financial liability to Harmony.

The nature of our mining operations presents safety risks.

The environmental and industrial risks identified above also present safety risks for Harmony's operations and its employees and could lead to the suspension and potential closure of operations for indeterminate periods. Safety risks, even in situations where no injuries occur, can have a material adverse effect on Harmony's operations and production. See Item 4: "*Information on the Company—Business Overview—Regulation—Health and Safety – South Africa*" and *"Integrated Annual Report for the 20-F 2016 – Harmony in Action – Safety and health"* on pages 36 to 47.

Illegal mining, or criminal mining, as well as theft of gold and copper bearing material at our operations could pose a threat to the safety of employees, result in damage to property and could expose the Company to liability.

Civil disturbances and criminal activities such as trespass, illegal mining, sabotage, theft and vandalism could lead to disruptions at certain of Harmony's operations.

The activities of illegal and artisanal miners, which include theft and shrinkage, could cause damage to Harmony's properties, including pollution, underground fires, or personal injury or death, for which Harmony could potentially be held responsible. Illegal mining could result in the depletion of mineral deposits, potentially making the future mining of such deposits uneconomic.

Rising gold and copper prices may result in an increase in gold and copper thefts. The occurrence of any of these events could have a material adverse effect on Harmony's financial condition on results of its operations.

Harmony's insurance coverage may prove inadequate to satisfy future claims against it.

Harmony has third-party liability coverage for most potential liabilities, including environmental liabilities. Harmony may be subject to liability for pollution (excluding sudden and accidental pollution) or other hazards against which we have not insured or cannot insure, including those for past mining activities. Harmony also maintains property and liability insurance consistent with industry practice, but this insurance contains exclusions and limitations on coverage. In addition, there can be no assurance that insurance will be available at economically acceptable premiums. As a result, Harmony's insurance coverage may not cover the claims against it for environmental or industrial accidents or pollution, which could have a material adverse effect on Harmony's financial condition.

Harmony's operations may be negatively impacted by inflation.

Harmony's operations have been materially affected by inflation. Inflation in South Africa has fluctuated widely in recent years, reaching 11.6% at the end of fiscal 2008 before decreasing since then, remaining within or just outside the inflation range of 3% - 6% set by the South African Reserve Bank. At the end of fiscal 2014, 2015 and fiscal 2016, inflation was 6.6%, 4.7% and 6.3%, respectively. However, working costs, in particular wages have increased in recent years, resulting in significant cost pressures for the mining industry. As a result of Eskom's planned capital expansion program to deal with power constraints, an average annual tariff increase of 8% for the five-year multi-year price determination period has been approved by NERSA with effect from April 1, 2013. An average annual increase of 8% was effected in April 2014, 12.69% was affected in April 2015 and 9.4% was affected in April 2016. There is a risk that further tariff increases in 2017 and in the future will have a negative effect on the profitability of our operations.

The inflation rate in PNG ended fiscal 2014 at 6% and 2015 at 6.1%, while the annualized inflation stood at 6.4% at the end of fiscal 2016.

Harmony's profits and financial condition could be adversely affected when cost inflation is not offset by devaluation in operating currencies or an increase in the price of gold.

The socio-economic framework in the regions in which Harmony operates may have an adverse effect on its operations and profits.

Harmony has operations in South Africa and PNG. As a result, changes to or instability in the economic or political environment in either of these countries or in neighboring countries could affect an investment in Harmony. These risks could include terrorism, civil unrest, nationalization, political instability, change in regulatory frameworks, renegotiation or nullification of existing contracts, leases, permits or other agreements, restrictions on repatriation of earnings or capital and changes in laws and policy, as well as other unforeseeable risks.

In PNG, a mining legislative and tax regime review has been commissioned whereby various PNG government agencies are involved in the process. The legislation being reviewed includes the Mining Act 1992, Mining Safety Act 1997, Income Tax Act 1959 and Environment Act 2000, and applicable regulations. Mineral Policy and mining-specific sector policies including offshore mining policy, sustainable development policy, involuntary relocation policy and mine closure policy are also being reviewed. The Chamber of Mines and Petroleum of PNG, as the representative industry body, has been collating information from industry participants regarding the review of current legislation and policy as part of the response to the governments mining legislation review.

It is difficult to predict the future political, social and economic environment in these countries, or any other country in which Harmony operates, and the impact government decisions may have on its business.

Actual and potential shortages of production inputs may affect Harmony's operations and profits.

Harmony's operational results may be affected by the availability and pricing of consumables such as fuel, chemical reagents, explosives, steel and other essential production inputs. Issues with regards to availability of consumables may result from shortages as well as long lead times to deliver, which could result in production delays and production shortfalls. These shortages and delayed deliveries may be experienced where industrial action affects Harmony's suppliers. These issues could also affect the pricing of the consumables, especially if shortages are experienced. The price of consumables may be substantially affected by changes in global supply and demand, along with weather conditions, governmental controls and other factors. A sustained interruption to the supply of any of these consumables would require Harmony to find acceptable substitute suppliers and could require it to pay higher prices for such materials. Any significant increase in the prices of these consumables would increase operating costs and affect production considerations.

Harmony's ability to service its debt will depend on its future financial performance.

Harmony's financial performance will be affected by its operating performance as well as by financial and other factors, and in particular the gold price, certain of which are beyond the control of the Company. Various financial and other factors may result in an increase in Harmony's indebtedness, which could adversely affect the Company in several respects, including:

- limiting its ability to access the capital markets;
- hindering its flexibility to plan for or react to changing market, industry or economic conditions;
- limiting the amount of cash flow available for future operations, acquisitions, dividends, or other uses;
- making it more vulnerable to economic or industry downturns, including interest rate increases;
- increasing the risk that it will need to sell assets, possibly on unfavorable terms, to meet payment obligations; or
- increasing the risk that it may not meet the financial covenants contained in its debt agreements or timely make all required debt payments.

We compete with mining and other companies for key human resources.

Harmony competes with mining and other companies globally to attract and retain key human resources at all levels with the appropriate technical skills and operating and managerial experience necessary to continue operating its business. The need to recruit, develop and retain skilled employees is particularly critical with historically disadvantaged South Africans ("**HDSAs**"), women in mining in South Africa, and recruiting and training local landowners in PNG. The global shortage of key mining specialists, including geologists, mining engineers, mechanical and electrical engineers, metallurgists and skilled artisans has been exacerbated by increased mining activity across the globe. There can be no assurance that Harmony will attract and retain skilled and experienced employees. Should Harmony lose any of its key personnel, its business may be harmed and its operational results and financial condition could be affected. See Item 4: "*Information on the Company—Business Overview—Regulation—Employees*" and *"Integrated Annual Report for the 20-F 2016 – Harmony in Action – Employees and communities"* on pages 48 to 58.

Since Harmony's labor force has substantial trade union participation, Harmony faces the risk of disruption from labor disputes and non-procedural industrial action.

Despite a history of constructive engagement with labor unions, there are periods when various stakeholders are unable to agree on dispute resolution processes. Disruptive activities on the part of labor, which normally differ in intensity, then become unavoidable. Due to the high level of union membership among our employees, we are at risk of production stoppages for indefinite periods due to strikes and other disputes, especially wildcat strikes. Inter-union rivalry may increase the risk of labor relations instability. In October 2015, Harmony concluded a three year wage agreement with unions representing the majority of the Company's employees. This agreement was extended to all employees irrespective of union affiliation. We are not able to predict whether we will experience significant labor disputes in future, or what the financial impact of any such disputes may be. See Item 4: "*Information on the Company—Business Overview—Regulation—Employees*", *"Integrated Annual Report for the 20-F 2016—Harmony in Action—Employees and communities"* on pages 48 to 58. South African employment law sets out minimum terms and conditions of employment for employees. Although these may be improved by agreements between us and the trade unions, prescribed minimum terms and conditions form the benchmark for all employment contracts. See *"Integrated Annual Report for the 20-F 2016 – Understanding Harmony – Material issues and stakeholder engagement"* on pages 31 to 35.

We are required to submit a report under South African employment law detailing the progress made towards achieving employment equity in the workplace. If this report is not submitted, we could incur substantial penalties.

Developments in South African employment law may increase our cash costs of production or alter our relationship with our employees and trade unions, which may have an adverse effect on our business, operating results and financial condition.

HIV/AIDS poses risks to us in terms of productivity due to sick absenteeism as a result of tuberculosis co-infection and costs.

The HIV/AIDS epidemic in South Africa and PNG poses risks to us in terms of potentially reduced productivity, and increased medical and other costs. If there is a significant increase in the incidence of HIV/AIDS infection and related diseases among the workforce over the next several years, this may have an adverse impact on our operations, projects and financial condition. See *"Integrated Annual Report for the 20-F 2016 – Harmony in Action – Safety and health"* on pages 36 to 47.

The cost of occupational healthcare services and the potential liabilities related to occupational health diseases may increase in future.

Harmony's operations are subject to health and safety regulations which could impose significant cost burdens. In South Africa the present Mine Health and Safety Act 29 of 1996 imposes various duties on mines and grants the authorities broad powers to, among others, close unsafe mines and order corrective action on health and safety matters. Operations in PNG are subject to similar duties and powers, including under the following laws and regulations: PNG Mining Act 1992, PNG Mining Safety Act 1997, PNG Mining Safety Regulation 1935 (updated 2006) and PNG Environment Act 2000.

There is a risk that the cost of providing health services and implementing various programs could increase in future, depending on changes to underlying legislation and the profile of its employees. This increased cost, should it transpire, is currently indeterminate.

The Occupational Diseases in Mines and Works Act 78 of 1973 ("**ODIMWA**") governs the payment of compensation and medical costs for certain illnesses contracted by people employed in mines or at sites where activities ancillary to mining are conducted. The principles of compensation under ODIMWA were tested in the Mr. Thembekekile Mankayi v AngloGold Ashanti court case. The Constitutional Court held that the compensation Mr Mankayi received under the ODIMWA was inferior to the compensation one would receive under the Compensation for Occupational Injuries and Diseases Act 130 of 1993. As a result, the Constitutional Court decided that an employee, who was awarded compensation in terms of ODIMWA, is not precluded from claiming common law damages from an employer. On May 13, 2016, the South Gauteng High Court certified a class action by current and former mineworkers against gold mining companies in South Africa (including Harmony). The class action would consist of two classes: the silicosis class; and the tuberculosis "**TB**" class. The class also includes dependents whose parents died after contracting silicosis and/or TB while working at the mines. While issues, such as negligence and causation, need to be proved by the claimant on a case-by-case basis, such a ruling could expose Harmony to claims related to occupational hazards and diseases (including silicosis and TB, which may be in the form of an individual claim, a class action or a similar group claim). See *"Item 8: Financial Information—Consolidated Statements and Other Financial Information—Legal Proceedings"* and *"Integrated Annual Report for the 20-F 2016—Harmony in Action—Safety and health"* on pages 36 to 47 for further information. It is uncertain as to whether the Company will incur significant costs related to silicosis and/or TB claims in the future. Following the engagement of stakeholders with a view to facilitate statutory compensation regime changes and owing to the limited information available on any claims and potential claims, and the uncertainty of the outcome of these types of claims, no accurate estimation can be made for the possible obligation. Should Harmony be unsuccessful in defending any claims that may be lodged, it would have an adverse impact on the Company's financial condition. See note 33 *"Commitments and Contingencies*" to our consolidated financial statements set forth beginning on page F-1.

Laws governing mineral rights affect our business and could impose significant costs and burdens.

Our operations in South Africa and PNG are subject to legislation regulating mineral rights. Certain of the Company's properties may be subject to the rights or the asserted rights of various community stakeholders, including indigenous people. The presence of those stakeholders may therefore have an impact on Harmony's ability to develop or operate its mining interests.

In South Africa, we are governed by the South African Mineral and Petroleum Resources Development Act, 2002 (Act 28 of 2002) ("**MPRDA**"). See Item 4: "*Information on the Company —Business Overview—Regulation—Mineral Rights - South Africa"* for a description of the principal objectives set out in the MPRDA.

The MPRDA was promulgated as effective legislation on May 1, 2004 and sought to transfer ownership of mineral resources to the South African people, with the South African government acting as custodian in order to, among other things, promote equitable access to the nation's mineral resources by South Africans, expand opportunities to historically disadvantaged persons who wish to participate in the South African mining industry and advance social and economic development. Owing to the change brought about by the MPRDA, provision for a transition from the old regime (in which the role of the South African government was regulatory in nature and in which the right to mine vested in the holder of the mineral rights) to the new regime (which provides for the South African government, acting through the Minister of Mineral Resources ("**Minister**"), to grant mining rights) has been made in the Transitional Provisions contained in Schedule II of the MPRDA (the "**Transitional Provisions**"). The Transitional Provisions provide for, among other things, the holders of then-existing "old order" mining rights to apply for the conversion of those old order rights into "new order" mining rights in accordance with the MPRDA within five years of May 1, 2004, or before the old order right expired, whichever was earlier. Old order mining rights were converted into new order mining rights in accordance with the MPRDA provided that the holder of the old order right fulfilled the requirements specified in the MPRDA, its Regulations and the Revised Mining Charter (as defined below). We currently continue to comply with the requirements of the MPRDA and the Broad-Based Socio-Economic Empowerment Charter for the South African mining industry published by the Minister in October 2002 ("**Original Mining Charter**"). Any failure to comply with the conditions of our mining rights, whether intentional or unintentional, could have a material adverse effect on our operations and financial condition.

On June 21, 2013, the Minister introduced the Mineral and Petroleum Resources Development Amendment Bill, 2013 (the **"MPRDA Bill**") into Parliament. The South African Department of Mineral Resources ("**DMR**") briefed the National Assembly's Portfolio Committee on Mineral Resources on July 30 and 31, 2013, however, the MPRDA Bill has not been assented to by the President and remains pending. There is a degree of uncertainty regarding the changes that will be brought about should the MPRDA Bill be made law; many changes are expected and we cannot yet determine the full impact that the MPRDA Bill may have on our business and there can be no assurance that such changes will not have a material adverse effect on our operations and financial condition.

The Original Mining Charter followed by a Revised Mining Charter (the "**Revised Mining Charter**") was published by the Minister on September 13, 2010. Among other things, the Original Mining Charter required each mining company to achieve a 15% HDSA ownership of mining assets within five years of the Mining Charter coming into effect and a 26% HDSA ownership of mining assets within 10 years of the Mining Charter coming into effect. The Revised Mining Charter contains guidelines envisaging, among other things, that mining companies should achieve a minimum of 40% HDSA representation at executive management (board) level, senior management (executive committee) level, core and critical skills, middle management level and junior management level and 10% participation by women in the mining industry, in each case in five years.

In March 2015, the DMR made an interim report of consolidated results of the self-assessment by reporting companies of compliance with the Mining Charter, reporting relatively broad compliance with the non-ownership requirements of the Revised Mining Charter. However, the DMR did not report the results of compliance with the HDSA ownership guidelines of the Mining Charter and noted that there is no consensus on certain applicable principles. It is therefore unclear what the outcomes were. It is also unclear whether or not the information provided during the audit process will be considered or used by the DMR for any purpose in the future.

BEE participation is an absolute requirement for the conversion of a mining right. Mining companies are required to achieve an effective HDSA ownership of 26% of mining companies. Harmony believes that it has complied with the requirements of the Revised Mining Charter's to achieve a minimum of 26% effective HDSA ownership of mining assets by 2014. *See "Integrated Annual Report for the 20-F 2016 – Harmony In Action – Mining Charter compliance scorecard"* on pages 78 to 80.

The DMR and the mining industry disagree on the interpretation of the Revised Mining Charter's ownership requirement, specifically the applicability of the "*once empowered, always empowered principle*", and have separately approached the High Court of South Africa for a declaratory order in this regard. Should the DMR, based on the declaratory order, find that Harmony is not in compliance with the Revised Mining Charter in relation to the ownership requirement, the Company may challenge the decision in court. The outcome of such court action is uncertain.

Should Harmony breach its obligations in complying with the MPRDA, the Revised Mining Charter or any future amendments to the Revised Mining Charter, its existing mining rights in South Africa could be suspended or cancelled by the Minister in accordance with the provisions of the MPRDA. It may also influence the Company's ability to obtain any new mining rights. Any such suspension or cancellation could have a material adverse effect on the results of operations as well as the Company's financial condition.

On April 15, 2016, the Minister published the Broad Based Black Economic Empowerment Charter for the South African Mining and Minerals Industry ("**draft Mining Charter"**). The Company is engaging with the DMR and key industry stakeholders on the content of a revised version of the draft Mining Charter. The MPRDA also obliges the holder of a mining right to pay royalties payable to the South African government in accordance with the Mineral and Petroleum Resources Royalty Act (Act 28 of 2008) (the "**MPRRA**"). The MPRRA provides for the payment of a royalty according to a formula based on gross sales and EBIT, as defined under the MPRRA, after the deduction of capital expenditure. This rate is then applied to revenue to calculate the royalty amount due, with a minimum of 0.5% and a maximum of 5% for gold mining companies. For fiscal 2016, the average royalty rate for our South African operations was 0.8% of gross sales.

In PNG, we are governed by the Mining Act of 1992 (PNG). Mineral rights in PNG are controlled by the government of PNG which initially awards exploration licenses but retains a right under the conditions of exploration license, at any time prior to the commencement of mining, to acquire a participating interest of up to 30% in any mineral discovery at historical exploration cost. The government then administers mining tenements under the relevant mining legislation, and mining companies must pay royalties to the government based on production. The types of tenements issued include: exploration license; mining lease; special mining lease; alluvial mining lease; lease for mining purpose; and mining easement.

The PNG government has commissioned a review of the mining regime, including the PNG government's right to acquire an interest in a mine development, the percentage extent of such right and the consideration payable for it. The Chamber of Mines and Petroleum of PNG, as the representative industry body, has been collating information from industry participants as part of the industry's response to the review proposals.

Harmony's PNG mining operation is subject to a 2% royalty payment to the government of PNG. If we want to expand any of our initiatives in PNG into additional areas under exploration, these operations would need to convert the existing exploration licenses prior to the start of mining and that process could require landowner title approval. There can be no assurance that any approval would be received.

Laws governing health and safety affect our business and could impose significant costs and burdens.

In South Africa, the Mine Health and Safety Act 29 of 1996 ("**MHSA**") requires that employers take and implement various measures to ensure the safety and health of persons working at a mine. This obligation is extended to any contractor employees that may be working at a mine. These obligations include the identification and assessment of risk, implementation of codes of practice and standards setting out safe work procedures, proper and appropriate training, supervision, medical surveillance and the provision of safe equipment and personal protective equipment. Further, Harmony must ensure compliance with various licenses, permissions or consents that have been issued to it in terms of the various pieces of applicable legislation.

An employer may be subjected to significant penalties and/or administrative fines for non-compliance under the MHSA and other health and safety legislation. Depending on the particular circumstances, litigation (criminal and/or civil) may be instituted against the employer in respect of an accident or incident which has resulted in the death of an employee (or contractor employee)

Any further changes to the health and safety laws which increase the burden of compliance on the employer and impose higher penalties for non-compliance may result in incurring further significant costs for us.

The safety of employees and contractors at Harmony's PNG mining operation is regulated by the Papua New Guinea Mining (Safety) Act 1977 and Regulation. In terms of section 6(1)(e)(i) of the act the inspector has the power to order the cessation of any part of the operations for an unlimited time as are necessary to carry the act into effect. Such order for cessation can often result in lower or a total stoppage of production resulting in significant financial losses during the cessation.

We are subject to extensive environmental regulations.

As a gold mining company, Harmony is subject to extensive environmental regulation. We expect the trend of rising production costs due to compliance with South African and PNG environmental laws and regulations to continue.

In South Africa, the MPRDA, certain other environmental legislation and the administrative policies of the South African government regulate the impact of the Company's prospecting and mining operations on the environment. On the suspension, cancellation, termination or lapsing of a prospecting or mining right, Harmony will remain liable for compliance with the provisions of various relevant regulations, including any rehabilitation obligations until a closure certificate is issued by the DMR. This liability will continue until the appropriate authorities have 1) certified that the Company has complied with such provisions or 2) authorized the transfer of liability to a competent party.

Estimates of ultimate closure and rehabilitation costs are significant and are based principally on current legal and regulatory requirements that may change materially. Environmental provisions are accrued when they become known, probable and can be reasonably estimated based on industry good practice. In future, Harmony may incur significant costs for compliance with increasingly stringent requirements being imposed under new legislation. Harmony may also face increased environmental costs should other mines in the vicinity fail to meet their obligations on the pumping or treatment of water.

The South African government has reviewed requirements imposed on mining companies to ensure environmental restitution. For example, following the introduction of an environmental rights clause in South Africa's constitution, a number of environmental legislative reform processes have been initiated. Legislation passed as a result of these initiatives has tended to be materially more onerous than previous laws in South Africa. Examples of such legislation include the MPRDA, the National Nuclear Regulator Act 1999, the National Water Act 1998 and the National Environmental Management Act 1998 ("**NEMA**"), which include stringent 'polluter pays' provisions. The adoption of these or additional or more comprehensive and stringent requirements, particularly for the management of hazardous waste, pollution of ground and groundwater systems and duty to rehabilitate closed mines, may result in additional costs and liabilities. The new financial provision regulations under NEMA which were published on November 20, 2015 are also likely to affect the amount of financial provision which is set aside for rehabilitation of the mine. These regulations place an emphasis on post closure water pumping and treatment and the need for upfront provision to be set aside for the management of these types of impacts. On September 9, 2016 proposed amendments to the financial provision regulations were published. One of the proposed amendments seeks to delay the transitional phase for implementation of these new laws until February 20, 2018.

Harmony's PNG operations are also subject to various laws and regulations relating to protection of the environment, which are similar in scope to those of South Africa. The Environment Act 2000 governs the environmental permitting and regulatory aspects of mining projects. An environmental impact statement is required when projects are likely to have a significant adverse impact on the environment. This statement must be lodged with the Conservation and Environment Protection Authority (previously the Department of Environmental Conservation) where, for large projects, it may be forwarded to the Environment Council for review. Public consultation is an integral part of this review.

See "*Integrated Annual Report for the 20-F 2016—Harmony in Action—Environmental performance*" on pages 59 to 77 for further discussion on the applicable legislation and our policies on environmental matters.

Mining companies are increasingly required to consider and ensure the sustainable development of, and provide benefits to, the communities and countries in which they operate.

As a result of public concern about the perceived ill effects of economic globalization, businesses in general and large international companies such as Harmony, in particular, face increasing public scrutiny of their activities.

Like other mining companies, Harmony is under pressure to demonstrate that while it seeks a satisfactory return on investment for shareholders, other stakeholders including employees, communities surrounding the operations and the countries in which they operate, also benefit from their commercial activities. Such pressures tend to be particularly focused on companies whose activities are perceived to have a high impact on their social and physical environment. The potential consequences of these pressures include reputational damage, legal suits and social spending obligations.

Existing and proposed mining operations are often located at or near existing towns and villages, natural water courses and other infrastructure. Mining operations must therefore be designed to mitigate and/or manage their impact on such communities and the environment. Specifically at our PNG operations, landowner rights require the payment of agreed levels of compensation for any adverse impact the mining operation may have, and the distribution by the government of PNG to landowner groups of an agreed share of royalties payable to the State by the operation. In addition, all new mining leases are subject to agreed national content plans addressing various aspects of employment and other community support. The cost of these measures could increase capital expenditure and operating costs and therefore impact Harmony's operational results and financial condition.

Compliance with emerging climate change regulations could result in significant costs for Harmony, and climate change may present physical risks to our operations.

GHGs are emitted directly by Harmony's operations and indirectly as a result of consuming electricity generated by external utilities. Emissions from electricity consumption are indirectly attributable to Harmony's operations. There are currently a number of international and national measures to address or limit GHG emissions, including the Kyoto Protocol, the Copenhagen Accord and the Paris Agreement ("**PA**"), in various phases of discussion or implementation.

As of October 5, 2016, enough contracting parties to the PA have ratified the PA for it to take legal effect. South Africa ratified the PA on April 22, 2016. PNG ratified the PA on September 21, 2016.

In line with this aim, the country's key carbon-emitting sectors, including energy and transport, had until end 2015 to finalize 'carbon budgets' and appropriate strategies to support these targets. Adopting a carbon budget model reflects government's acceptance of the relative energy and carbon intensity of the economy and the need to create the setting required for industries to make the transition to a more carbon-constrained environment.

In November 2015, a draft Carbon Tax Bill was published for public consultation – the draft bill anticipates that the carbon tax will be implemented on January 1, 2017. At this time it is not possible to determine the ultimate impact of the proposed carbon tax on the Company. Nevertheless, Harmony has set its internal carbon price (for the South African operations) to match that of the proposed carbon tax. Harmony is at risk due to potential pass through costs from its suppliers in the short term from increased fuel prices. As the draft bill stands, carbon tax on liquid fuels will be imposed at the source. It is estimated that the increased fuel price would be R0.13/liter. This will have an impact on Harmony's operational expenses.

The Minister of Environmental Affairs noted that government would actively consult with industry on developing carbon budgets to identify an "optimal combination" of mitigation actions to strike a balance between South Africa's socio-economic imperatives, especially creating and preserving jobs, as well as the need to manage climate change impacts and contribute to global efforts to stabilize GHG concentrations.

From a medium and long-term perspective, we are likely to see an increase in costs relating to our energy-intensive assets and assets that emit significant amounts of GHG as a result of regulatory initiatives in South Africa. These regulatory initiatives will be either voluntary or mandatory and may impact our operations directly or by affecting our suppliers or customers. These costs may include, among others, emission measurement and reduction, audit processes and human resource costs. Non-compliance with statutory initiatives may result in monetary liabilities. Insurance premiums may increase and our position relative to industry competitors may change. Assessments of the potential impact of future climate change regulation are still uncertain, given the wide scope of potential regulatory change in South Africa. PNG's national office of climate change and environmental sustainability is studying the potential for future economic growth to be driven by renewable energy. PNG has adopted a climate change policy but implementation actions to date are very limited. The implications of the climate change policy on Harmony's operations in PNG have not yet been established but are not expected to have significant impacts.

The largest portion of GHG emissions is predominantly electricity-related, with electricity expenditure amounting to approximately 16% of Harmony's cash costs in South Africa. While cost management is clearly a strategic issue for Harmony, of even greater importance is that energy supply be constant and reliable, given the implications of loss of energy on both production and health and safety. GHG emissions regulations, which would increase the price of energy, will affect Harmony significantly, as will regulation that stipulates emission thresholds, or sets technology standards that may result in insecure energy supply. Already certain compliance costs from power suppliers are being passed on to the Group in the form of price increases. For instance, in South Africa since 2009, Harmony has paid a levy of R0.02 - R0.035 per kilowatt hour for electricity generated by fossil fuels. In the 2015 budget speech the Minister of Finance proposed an increase in the electricity levy by an additional R0.02 per kilowatt hour. The implementation of the proposed increase in the electricity levy is still to be determined. These levies may increase over time and additional levies may be introduced in future in South Africa or PNG, which could result in a significant increase in our costs.

See *"Integrated Annual Report for the 20-F 2016 —Harmony in Action—Environmental performance"* on pages 68 to 70 for disclosure regarding our GHG emissions.

Our operations in South Africa are subject to water use licenses, which could impose significant costs.

Under South African law, Harmony's local operations are subject to water use licenses that govern each operation's water use. These licenses require, among other issues, that mining operations achieve and maintain certain water quality limits for all water discharges, where these apply. The majority of our South African operations are lawful users with existing water permits in terms of the Water Act of 1954. Nevertheless, the South African operations have applied to the relevant regional directors for water use licenses in terms of the National Water Act, 1998. Submissions were made as early as 2003 and Harmony has been working closely with the regional directors in the review process. A few operations have been issued with draft licenses for review and iteration. Kusasalethu has received its water use license, subject to certain onerous conditions, which we have applied to be amended and are hopeful will be amended in our favor. For the remaining licenses we anticipate that the conditions of the licenses may require Harmony to consider and implement alternate water management measures that may have a significant cost implication for our business. We intend working collaboratively with the regional departments to get to an amicable outcome that is in the best interest of the licensee and the national water resource, as any failure on Harmony's part to achieve or maintain compliance with the requirements of these licenses for any of its operations may result in Harmony being subject to penalties, fees and expenses or business interruption due to revoked water licenses. Any of these could have a material effect on our business, operating results and financial condition.

There is a possibility of the South African National Treasury and Department of Water and Sanitation instituting an environmental levy for the management of acid mine drainage ("**AMD**") in future. AMD is a common occurrence on the gold mines of the Witwatersrand Basin. AMD is caused by the exposure of sulfide-rich ore to oxygen and water during the processes of mining, crushing, mineral recovery, and storage of the various waste streams. Any such environmental levy could have a material effect on our business, operating results and financial condition.

See *"Integrated Annual Report for the 20-F 2016 —Harmony in Action—Environmental performance"* on pages 71 to 73 and pages 73 to 74 for disclosure regarding our water usage and management.

We may have exposure to rehabilitate potential groundwater pollution, which may include salination, and radiation contamination that may exist where we have operated or continue to operate.

Due to the interconnected nature of mining operations, any proposed solution for potential flooding and decant risk posed by deep groundwater needs to be a combined one supported by all mines located in the goldfields and government in the event of legacy issues. As a result, the DMR and affected mining companies are involved in developing a regional mine closure strategy. In view of limited current information, no reliable estimate can be made for any possible obligations or liabilities for the Company, which could be material and have an adverse impact on Harmony's financial condition. The new financial provision regulations under NEMA published on November 20, 2015 are also likely to affect the amount of financial provision which is set aside for rehabilitation of the mine. These regulations (draft amendments to which are currently out for public comment) place an emphasis on post-closure water pumping and treatment and the need for upfront provision to be set aside for the management of these types of impacts. No provision for any potential liability has been made in the financial statements.

See *"Integrated Annual Report for the 20-F 2016 —Harmony in Action—Environmental performance"* on pages 61 to 63.

The use of contractors at certain of the Company's operations may expose Harmony to delays or suspensions in mining activities and increases in mining costs.

Harmony uses contractors at certain of its operations to mine and deliver ore to processing plants as well as for other purposes. At mines employing mining contractors, contracting costs represent a significant proportion of the total operating costs of these operations and the Company does not own all of the mining equipment.

Harmony's operations could be disrupted, resulting in additional costs and liabilities, if the mining contractors at affected mines have financial difficulties, if a dispute arises in renegotiating a contract, or if there is a delay in replacing an existing contractor and its operating equipment to meet business needs at expected cost levels. Increases in contract mining rates, in the absence of associated productivity increases, will also have an adverse impact on the Company's results of operations and financial condition.

In addition, Harmony's reduced control over those aspects of operations which are the responsibility of contractors, their failure to comply with applicable legal, human rights and regulatory requirements, or their inability to manage their workforce or provide high quality services or a high level of productivity could adversely affect Harmony's reputation, results of operations and financial condition, and may result in the Company incurring liability to third parties due to the actions of contractors.

Our jointly-controlled assets may not comply with our standards.

Harmony does not have full management control over some of its assets which are controlled and managed by joint venture partnerships. The control environment of these assets may not align with our management and operating standards, controls and procedures. Failure to adopt equivalent standards, controls and procedures could lead to higher costs and reduced production, which could adversely affect our results and reputation.

Breaches in our information technology security processes and violations of data protection laws may adversely impact the conduct of our business activities.

Harmony maintains global information technology ("**IT**") and communication networks and applications to support our business activities. Our extensive IT infrastructure and network may experience service outages that may adversely impact the conduct of our business activities. IT security processes protecting Harmony's IT infrastructure and network may not prevent future malicious action or fraud by individuals, groups or organizations resulting in the corruption of operating systems, theft of commercially sensitive data, including commercial price outlooks, mergers and acquisitions and divestment transactions, misappropriation of funds and disruptions to our business operations.

Investors in the United States may have difficulty bringing actions, and enforcing judgments, against us, our directors and our executive officers based on the civil liabilities provisions of the federal securities laws or other laws of the United States or any state thereof.

We are incorporated in South Africa. Each of our directors and executive officers (and our independent registered public accounting firm) resides outside the United States. Substantially all of the assets of these persons and substantially all our assets are located outside the United States. As a result, it may not be possible for investors to enforce a judgment against these persons or ourselves obtained in a court of the United States predicated upon the civil liability provisions of the federal securities or other laws of the United States or any state thereof. A foreign judgment is not directly enforceable in South Africa, but constitutes a cause of action which will be enforced by South African courts provided that:

- the court that pronounced the judgment had jurisdiction to entertain the case according to the principles recognized by South African law with reference to the jurisdiction of foreign courts;
- the judgment is final and conclusive;
- the judgment has not lapsed;
- the recognition and enforcement of the judgment by South African courts would not be contrary to public policy, including observance of the rules of natural justice which require that the documents initiating the United States proceeding were properly served on the defendant and that the defendant was given the right to be heard and represented by counsel in a free and fair trial before an impartial tribunal;
- the judgment does not involve the enforcement of a penal or revenue law; and
- the enforcement of the judgment is not otherwise precluded by the provisions of the Protection of Business Act 99 of 1978, as amended, of the Republic of South Africa.

Compliance with new and changing corporate governance and public disclosure requirements adds uncertainty to our compliance policies and increases our costs of compliance.

Laws, regulations and standards relating to accounting, corporate governance and public disclosure, “conflict minerals” and “responsible” gold, new SEC regulations and other listing regulations applicable to us are subject to change and can create uncertainty for companies like us. New or changed laws, regulations and standards could lack specificity or be subject to varying interpretations. Their application in practice may evolve over time as new guidance is provided by regulatory and governing bodies. This could result in continuing uncertainty on compliance matters and higher costs of compliance as a result of ongoing revisions to such governance standards.

In terms of Section 404 of the Sarbanes-Oxley Act of 2002 (the “**Sarbanes-Oxley Act**”), we are required to furnish a report by our management on our internal control over financial reporting. The report in this annual report contains, among other matters, an assessment of the effectiveness of our internal control over financial reporting as of the end of the fiscal year, including a statement as to whether or not our internal controls over financial reporting are effective. If we fail to maintain the adequacy of our internal controls, we may not be able to ensure that we can conclude on an ongoing basis that we have effective internal control over financial reporting in accordance with the Sarbanes-Oxley Act. The requirement to evaluate and report on our internal controls also applies to companies that we may acquire and therefore, this assessment may be complicated by any future acquisitions. While we continue to dedicate resources and management time to ensuring that we have effective controls over financial reporting, failure to achieve and maintain an effective internal control environment could have a material adverse effect on the market’s perception of our business and our stock price. See Item 15: *“Controls and Procedures”* for management’s assessment as of June 30, 2016. In addition to management’s assessment of internal controls over financial reporting, we are required to have our independent registered public accounting firm publicly disclose their conclusions regarding the effectiveness of Harmony’s internal controls over financial reporting.

We are committed to maintaining high standards of corporate governance and public disclosure, and our efforts to comply with evolving laws, regulations and standards in this regard have resulted in, and are likely to continue to result in, increased general and administrative expenses.

Failure to comply with laws, regulations, standards, contractual obligations whether following a breach or breaches in governance processes or fraud, bribery and corruption may lead to regulatory penalties, loss of licenses or permits, negative effects on our reported financial results, and adversely affect our reputation.

Harmony operates in multiple jurisdictions, including those with less developed political and regulatory environments, and within numerous and complex frameworks. Our governance and compliance processes may not prevent potential breaches of law, accounting principles or other governance practices.

Harmony’s Code of Conduct and Behavioral Code, among other policies, standards and guidance, and training thereon may not prevent instances of unethical or unlawful behavior, including bribery or corruption, nor guarantee compliance with legal and regulatory requirements, and breaches may not be detected by management.

Sanctions for failure by the Company or others acting on its behalf to comply with these laws, regulations, standards and contractual obligations could include fines, penalties, imprisonment of officers, litigation, and loss of operating licenses or permits, suspensions of operations, negative effects on Harmony's reported financial results and may damage the Company's reputation. Such sanctions could have a material adverse impact on the Company's financial condition and results of operations.

Investors may face liquidity risk in trading our ordinary shares on the JSE Limited.

The primary listing of our ordinary shares is on the JSE Limited. Historically, the trading volumes and liquidity of shares listed on the JSE have been low relative to other major markets. The ability of a holder to sell a substantial number of our ordinary shares on the JSE in a timely manner, especially in a large block trade, may be restricted by this limited liquidity. See Item 9: *"The Offer and Listing—Listing Details—The Securities Exchange in South Africa.*"

Sales of large quantities of our ordinary shares and ADSs, or the perception that these sales may occur, could adversely affect the prevailing market price of such securities.

The market price of our ordinary shares or ADSs could fall if large quantities of ordinary shares or ADSs are sold in the public market, or there is a perception in the marketplace that such sales could occur. Subject to applicable securities laws, holders of our ordinary shares or ADSs may decide to sell them at any time. The market price of our ordinary shares or ADSs could also fall as a result of any future offerings it makes of ordinary shares, ADSs or securities exchangeable or exercisable for its ordinary shares or ADSs, or the perception in the marketplace that these sales might occur. We may make such offerings of additional ADS rights, letters of allocation or similar securities from time to time in the future.

Shareholders outside South Africa may not be able to participate in future issues of securities (including ordinary shares) carried out by or on behalf of Harmony.

Securities laws of certain jurisdictions may restrict Harmony's ability to allow participation by certain shareholders in future issues of securities (including ordinary shares) carried out by or on behalf of Harmony. In particular, holders of Harmony securities who are located in the United States (including those who hold ordinary shares or ADSs) may not be able to participate in securities offerings by or on behalf of Harmony unless a registration statement under the Securities Act is effective with respect to such securities or an exemption from the registration requirements of the Securities Act is available thereunder. Securities laws of certain other jurisdictions may also restrict Harmony's ability to allow the participation of all holders in such jurisdictions in future issues of securities carried out by Harmony. Holders who have a registered address or are resident in, or who are citizens of, countries other than South Africa should consult their professional advisors as to whether they require any governmental or other consents or approvals or need to observe any other formalities to enable them to participate in any offering of Harmony securities.

The liquidity and price of our ADRs, and our ability to raise capital, may be negatively impacted if our ADSs are delisted from the NYSE and by the measures that we take to address non-compliance with the NYSE continued listing standards.

Our ADRs are currently listed for trading on the NYSE. There are a number of continuing requirements that must be met in order for our ADRs to remain listed on the NYSE and the failure to meet these listing standards could result in the delisting of our ADRs from the NYSE. On September 8, 2015, we received notice that we are not in compliance with the continued listing standard requiring a listed security to maintain a minimum average closing price of $1.00 per ADR over a consecutive 30-trading-day period. Under the NYSE's rules, we had a period of six months from the date of the NYSE notice to bring the 30-trading-day average closing price of our ADRs above $1.00. The trading price of Harmony's ADRs complied with the continued listing standard within the six months' notice period and therefore no further action was required. In the event we are not able to meet the requirements necessary for continued listing on the NYSE, our ADRs could be subject to delisting from the NYSE. See Item 9: *"The Offer and Listing—A. Offer and Listing Details".*

If our ADSs cease to be listed for trading on the NYSE for any reason, the liquidity of our ADSs may be materially reduced and result in a corresponding material reduction in the price of our ADSs. Furthermore, any such delisting could harm our ability to raise capital on terms acceptable to us, or at all, and may result in the potential loss of confidence by investors, suppliers, business partners, licensees, customers and employees. Such consequences may materially and adversely affect our business, financial condition and results of operations.

As we have a significant number of outstanding share options, our ordinary shares are subject to dilution.

We have several employee share option schemes in operation. The remaining active employee share option scheme came into effect in 2006, while awards under an employee share ownership plan ("**ESOP**") governed by a trust called the Tlhakanelo Employee Share Trust ("**Tlhakanelo Trust**") for employees other than management were made in August 2012 and in March of each subsequent year. Our shareholders have authorized up to 60,011,669 of the issued share capital to be used for these plans. As a result, shareholders' equity interests in us are subject to dilution to the extent of the potential future exercises of the options through share schemes.

We may not pay dividends or make similar payments to our shareholders in the future.

Harmony's dividend policy is to pay cash dividends only if funds are available for that purpose. Whether funds are available depends on a variety of factors, including the amount of cash available, our capital expenditures and other cash requirements existing at the time. Under South African law, we are only entitled to pay a dividend or similar payment to shareholders if we meet the solvency and liquidity tests set out in the Companies Act 71 of 2008 (as amended) including its Regulations (the "**Companies Act**") and our current Memorandum of Incorporation. Cash dividends or other similar payments may not be paid in the future.

On April 1, 2012, a dividends tax ("**Dividends Tax**") was introduced at a rate of 15% on dividends declared by South African companies to beneficial shareholders borne by the shareholder receiving the dividend. This replaced Secondary Tax on Companies. Although the substitution of Secondary Tax on Companies with Dividends Tax may reduce the tax payable on our South African operations, thereby increasing distributable earnings, the withholding tax will generally reduce the amount of dividends or other distributions received by shareholders.

In addition, Harmony's foreign shareholders face investment risk from currency exchange rate fluctuations affecting the market value of any dividends or distributions paid by the Company.

ITEM 4. INFORMATION ON THE COMPANY

A. HISTORY AND DEVELOPMENT OF THE COMPANY

The information set forth under the headings:

- "—About this report" on pages 3 to 4;
- "—Who we are" on pages 5 to 7;
- "—How we create value" on pages 8 to 9;
- "—Our strategy" on page 25;
- "—Understanding Harmony—Our business context" on pages 26 to 28;
- "—Harmony in Action—Operational performance" on pages 81 to 109;
- "—Harmony in Action—Projects and exploration" on pages 110 to 123;
- "—Directorate and administration" on page 152.

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference. Also see note 19 *"Investments in Associates"* and note 20 *"Investments in Joint Operations"* of our consolidated financial statements, set forth beginning on page F-1.

In the 2016 fiscal year, we did not receive any public takeover offers by third parties or make any public takeover offers in respect of other companies' shares.

Recent Developments

Developments since June 30, 2016

Since the end of fiscal 2016, the following significant events have occurred:

On July 7, 2016, Harmony repaid the remaining R300 million (US$20 million) outstanding on the R1.3 billion Nedbank ZAR facility.

During July 2016, Harmony entered into short term gold forward sale contracts for a total of 432 000 ounces over a period of 24 months. These contracts manage variability of cash flows for approximately 20% of the Group's total production and were concluded at an average gold price of R682,000/kg. We plan on applying cash flow hedge accounting to these contracts. The financial effect will be determined as the contracts mature as the realized gain or loss is dependent on the R/kg gold price on the date of maturity.

On August 15, 2016, the Harmony board declared a dividend of 50 SA cents (4 US cents) for the year ended June 30, 2016. US$14.9 million was paid on September 19, 2016.

On August 25, 2016, an application for a special mining lease for the Wafi-Golpu project was submitted to the Mineral Resources Authority in Papua New Guinea. Submission of this application follows reviews of the feasibility study for the Wafi-Golpu project by the boards of directors of both Harmony and Newcrest Mining Limited (Newcrest), Harmony's joint venture partner in the project. Further project development will be subject to the granting of the special mining lease, the obtaining of all necessary permits, approvals and agreements and, ultimately, approval by the boards of both Harmony and Newcrest.

On September 19, 2016, Harmony announced that it would acquire Newcrest's 50% of Hidden Valley for a cash consideration of US$1, subject to certain regulatory approvals. Harmony will assume all liabilities and expenses related to the Hidden Valley joint venture and mine, including all closure, rehabilitation and remediation obligations, with effect from August 31, 2016. Newcrest will pay an amount of US$22.5 million as its once-off contribution towards Hidden Valley's future closure liability. Harmony and Newcrest will remain joint venture partners in the Wafi-Golpu project. The transaction became unconditional on October 25, 2016. Management will begin the process for the purchase price allocation in accordance with IFRS 3, *Business Combinations*. An updated life-of-mine plan will be completed for Hidden Valley. On completion of the transaction, 100% of the operation's assets, liabilities, income and expenses will be recognized in the financial statements.

B. BUSINESS OVERVIEW

The information set forth under the headings:

- *"—Who we are"* on pages 5 to 7;
- *"—Understanding Harmony"* on pages 25 to 35;
- *"—Harmony in Action—Safety and health"* on pages 36 to 47;
- *""—Harmony in Action—Employees and communities*" on pages 48 to 58;
- *"—Harmony in Action—Environmental performance"* on pages 59 to 77;
- *"—Harmony in Action—Operational performance"* on pages 81 to 109;
- *"—Harmony in Action—Projects and exploration"* on pages 110 to 123;

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

Capital Expenditures

Capital expenditures for all operations and capitalized exploration incurred for fiscal 2016 amounted to US$164 million, compared with US$226 million in fiscal 2015 and US$244 million in fiscal 2014. During fiscal 2016, capital expenditure at PNG accounted for 13% of the total, with Kusasalethu accounting for 15%, Phakisa, Tshepong and Target 1 each accounting for 13% of the total. During fiscal 2015, capital expenditure at PNG accounted for 9% of the total, with Kusasalethu accounting for 19%, Phakisa accounting for 16% and Tshepong accounting for 13% of the total. During fiscal 2014, capital expenditure at PNG accounted for 5% of the total, with Kusasalethu accounting for 20% and Phakisa and Target 1 each accounting for 14% and 11% respectively of the total.

The focus of our capital expenditures in recent years has been underground development and plant improvement and upgrades. During fiscal 2016, the capital expenditure was funded from the Company's cash generated by operation. See Item 5: *"Operating and Financial Review and Prospects—Liquidity and Capital Resources"*.

We have budgeted approximately US$200 million for capital expenditures in fiscal 2017. We currently expect that our planned operating capital expenditures will be financed from operations and new borrowings as needed. Details regarding the capital expenditure for each operation is included in the table below.

	Capital expenditure budgeted for fiscal 2017 (US$'million)
South Africa	
Kusasalethu	26
Doornkop................	16
Phakisa	25
Tshepong	31
Masimong...............	7
Target 1	23
Bambanani.............	7
Joel	17
Unisel	6
Other – surface	16
International	
Hidden Valley	6
Total operational capital expenditure	**180**
Golpu......................	18
Other international..	2
Total capital expenditure	**200**

Reserves

As at June 30, 2016, we have declared attributable gold equivalent proved and probable reserves of 36.9 million ounces: 16.8 million ounces gold in South Africa and 20.2 million gold and gold equivalent ounces in PNG. In instances where individual deposits may contain multiple valuable commodities with a reasonable expectation of being recovered (for example gold and copper in a single deposit) Harmony computes a gold equivalent to more easily assess the value of the deposit against gold-only mines. Harmony does this by calculating the value of each of the commodity, then dividing the product by the price of gold. For example, the gold equivalent of a gold and copper deposit would be calculated as follows: ((gold ounces x gold price per ounce) + (copper pounds x copper price per pound)) / gold price per ounce. All calculations are done using metal prices as stipulated in the discussion below. Harmony assumes a 100% metallurgical recovery in its calculations unless otherwise stated. The year-on-year negative variance in mineral reserves is due to the following reasons:

- normal depletion of 1.2 million ounces;
- a net decrease of 4.5 million ounces in reserves due to changes at operations (mainly at Kusasalethu where the revised life-of-mine focuses on the higher grade portion of the ore body).

We use the SAMREC Code, which sets out the internationally recognized procedures and standards for reporting of mineral resources and mineral reserves. We use the term “mineral reserves” herein, which has the same meaning as “ore reserves”, as defined in the SAMREC Code. Our reporting of the PNG Mineral Reserves complies with the 2012 JORC code. This code is materially the same as the SAMREC Code. In reporting of reserves, we have complied with the SEC's Industry Guide 7.

For the reporting of Mineral Reserves the following parameters were applied:

- a gold price of US$1,150 per ounce;
- an exchange rate of R12.85 per US dollar,

the above parameters resulting in a gold price of R475,000/kg for the South African assets;

- the Hidden Valley Operation and Wafi-Golpu project in the Morobe Mining Joint Ventures used prices of US$1,150/oz gold (“**Au”)**, US$15.00/oz silver (“**Ag**”), US$5.00/lb molybdenum (“**Mo**”) and US$3.00/lb copper (“**Cu**”) at an exchange rate of US$0.80 per A$.
- gold equivalent ounces are calculated assuming a US$1,150/oz Au, US$ 3.00/lb Cu and US$15.00/oz Ag with 100% recovery for all metals. These assumptions are based on those used in the 2016 feasibility study; and
- “gold equivalent” is computed as the value of the Company’s gold, silver and copper from all mineral resources/reserves classifications divided by the price of gold. All calculations are done using metal prices as stipulated.

In order to define the proved and probable mineral reserve at our underground operations, we apply the concept of a cut-off grade. At our underground operations in South Africa, this is done by defining the optimal cut-off grade as the lowest grade at which an orebody can be mined such that the total profits, under a specified set of mining parameters, are maximized. The cut-off grade is determined using our Optimizer computer program which requires the following as input:

- the database of measured and indicated resource blocks (per operation);
- an assumed gold price which, for this mineral reserve statement, was taken as R475,000 per kilogram (gold price of US$1,150 per ounce and an exchange rate of R12.85 per US dollar);
- planned production rates;
- the mine recovery factor which is equivalent to the mine call factor (“**MCF**”) multiplied by the plant recovery factor; and
- planned cash costs (cost per tonne).

Rand per tonne cash costs of the mines are historically based, but take into account distinct changes in the cost environment, such as the future production profile, restructuring, right-sizing, and cost reduction initiatives.

For the block cave reserve at Golpu (PNG), we used our consultants’ proprietary tool called “Block Cave mine optimizing software computer program” to define the optimal mine plan and sequencing.

The open pit reserve at Hidden Valley (PNG) is defined by a pit design based on the optimal output from Whittle open pit optimization software.

See the table below in this section for the cut-off grades and cost per tonne for each operation.

The mineral reserves represent that portion of the measured and indicated resources above cut-off in the life-of-mine plan and have been estimated after consideration of the factors affecting extraction, including mining, metallurgical, economic, marketing, legal, environmental, social and governmental factors. A range of disciplines which includes geology, survey, planning, mining engineering, rock engineering, metallurgy, financial management, human resources management and environmental management have been involved at each mine in the life-of-mine planning process and the conversion of resources into reserves. The oreflow-related modifying factors used to convert the mineral resources to mineral reserves through the life-of-mine planning process are stated for each individual operation. For these factors, historical information is used, except if there is a valid reason to do otherwise. Owing to depth and rock engineering requirements at our underground mines, some mines design stope support pillars into their mining layouts which accounts for approximately 7% to 10% discounting. Further discounting relates to the life-of-mine extraction to provide for geological losses.

Our standard for narrow reef sampling with respect to both proved and probable reserve calculations for underground mining operations in South Africa is generally applied on a 6 meter by 6 meter grid. Average sample spacing on development ends is at 2 meter intervals in development areas. For the massive mining at the Target 1 operation, our standard for sampling with respect to both proved and probable reserves are fan drilling with "B" sized diamond drill holes (43mm core) sited at 50 meter spaced sections along twin access drives. The Kalgold opencast operations are sampled on diamond drill and reverse circulation drill spacing of no more than 25 meters on average. Surface mining at South African operations other than Kalgold involves recovering gold from areas previously involved in mining and processing, such as metallurgical plants, waste rock dumps and tailing dams (slimes and sand) for which random sampling is used.

The PNG resources are hosted in large porphyry or related mesothermal geological systems. Data is gained through diamond drilling using PQ down to NQ sized core. The core is cut in half, one half sampled at a maximum of 2 meter intervals and the other half stored in designated core storage facilities. Drill spacing at our Hidden Valley operations is typically on less than 20 meter centers for measured category, 20 to 40 meter centers for the Indicated category and greater than 40 meters for Inferred category material. Due to the nature of the Golpu porphyry mineralization, drill spacing is increased to 100 to 200 meters for indicated and greater for inferred. Assaying for gold is by fire assay and various methods are used for copper and other elements. All assays informing the resource calculation are analyzed at a National Association of Testing Authorities ("**NATA**") accredited commercial laboratory. Extensive Quality Assurance/Quality Control work is undertaken and data is stored in an electronic database.

Our mining operations' reported total proved and probable reserves as of June 30, 2016 are set out below:

Mineral Reserves statement (Imperial) as at June 30, 2016

Operations Gold	PROVED RESERVES			PROBABLE RESERVES			TOTAL RESERVES		
	Tons (millions)	Grade (oz/ton)	Gold oz[1] (000)	Tons (millions)	Grade (oz/ton)	Gold oz[1] (000)	Tons (millions)	Grade (oz/ton)	Gold oz[1] (000)
South Africa Underground									
Bambanani	1.4	0.323	449	—	—	—	1.4	0.323	449
Joel	2.8	0.153	435	3.3	0.134	440	6.1	0.143	875
Masimong	1.6	0.118	193	0.3	0.112	30	1.9	0.117	223
Phakisa	6.2	0.191	1,185	2.1	0.209	437	8.3	0.196	1,622
Target 1	3.0	0.134	401	4.3	0.139	591	7.3	0.137	992
Tshepong	18.9	0.160	3,022	3.9	0.128	500	22.8	0.155	3,522
Unisel	1.4	0.122	168	1.4	0.127	180	2.8	0.124	348
Doornkop	1.9	0.147	278	2.8	0.152	431	4.7	0.150	709
Kusasalethu	4.2	0.209	878	0.2	0.155	36	4.4	0.206	914
Total South Africa Underground	41.4	0.169	7,009	18.3	0.145	2,645	59.7	0.162	9,654

Mineral Reserves statement (Imperial) as at June 30, 2016

Operations Gold	PROVED RESERVES			PROBABLE RESERVES			TOTAL RESERVES		
	Tons (millions)	Grade (oz/ton)	Gold oz[1] (000)	Tons (millions)	Grade (oz/ton)	Gold oz[1] (000)	Tons (millions)	Grade (oz/ton)	Gold oz[1] (000)
South Africa Surface									
Kalgold	5.8	0.028	165	13.6	0.033	443	19.4	0.031	608
Free State Surface—									
Phoenix	88.0	0.008	712	—	—	—	88.0	0.008	712
St Helena	193.9	0.008	1,507	—	—	—	193.9	0.008	1,507
Central Plant	—	—	—	73.2	0.008	551	73.2	0.008	551
Other	—	—	—	551.8	0.007	3,726	551.8	0.007	3,726
Total South Africa Surface	287.7	0.008	2,384	638.6	0.007	4,720	926.3	0.008	7,104
Total South Africa	329.1		9,393	656.9		7,365	986.0		16,758
Papua New Guinea[2]									
Hidden Valley	1.4	0.032	45	12.6	0.047	599	14.0	0.046	644
Hamata	0.1	0.031	2	1.1	0.065	71	1.2	0.063	73
Golpu	—	—	—	209.0	0.026	5,522	209.0	0.026	5,522
Total Papua New Guinea	1.5	0.032	47	222.7	0.028	6,192	224.2	0.028	6,239
Total	330.6		9,440	879.6		13,557	1,210.2		22,997

(1) Metal figures are fully inclusive of all mining dilutions and gold losses, and are reported as mill delivered tons and head grades. Metallurgical recovery factors have not been applied to the reserve figures.

(2) Represents Harmony's attributable interest of 50%.

Note: 1 ton = 907 kg = 2,000 lbs.

In addition to the gold reserves, we also report our gold equivalents for reserves for silver and copper from our PNG operations. Gold equivalent ounces are calculated assuming a US$1,150/oz for gold, US$3.00/lb copper and US$15.00/oz for silver with 100% recovery for all metals.

Gold Equivalents [2]

Silver	Proved reserves		Probable reserves		Total reserves	
	Tons (millions)	Gold Equivalents (oz)[1] (000)	Tons (millions)	Gold Equivalents (oz)[1] (000)	Tons (millions)	Gold Equivalents (oz)[1] (000)
Hidden Valley	1.4	12	12.6	166	14.0	178
Copper	**Proved reserves**		**Probable reserves**		**Total reserves**	
	Tons (millions)	**Gold Equivalents (oz)[1] (000)**	**Tons (millions)**	**Gold Equivalents (oz)[1] (000)**	**Tons (millions)**	**Gold Equivalents (oz)[1] (000)**
Golpu	—	—	209.0	13,471	209.0	13,471
Total Gold Equivalents	1.4	12	221.6	13,907	223.0	13,919
Total Harmony including gold equivalents	330.6	9,452	879.6	27,464	1,210.2	36,916

In addition to the gold reserves, we also report our attributable reserves for silver and copper from our PNG operations. Metal prices are assumed at US$15.00/oz for silver, US$3.00/lb for copper, and molybdenum at US$5.00/lb.

Papua New Guinea: Other [2]

Silver	Proved Reserves			Probable Reserves			Total Reserves		
	Tons (millions)	Grade (oz/ton)	Silver oz[1] (000)	Tons (millions)	Grade (oz/ton)	Silver oz[1] (000)	Tons (millions)	Grade (oz/ton)	Silver oz[1] (000)
Hidden Valley................	1.4	0.628	882	12.6	1.012	12,789	14.0	0.973	13,671
Copper	**Tons (millions)**	**Grade (%)**	**Cu lb[1] (millions)**	**Tons (millions)**	**Grade (%)**	**Cu lb[1] (millions)**	**Tons (millions)**	**Grade (%)**	**Cu lb[1] (millions)**
Golpu............................	—	—	—	209.0	1,144	5,269	209.0	1.144	5,269

(1) Metal figures are fully inclusive of all mining dilutions and gold losses, and are reported as mill delivered tons and head grades. Metallurgical recovery factors have not been applied to the reserve figures.

(2) Represents Harmony's attributable interest of 50%.

Note: 1 ton = 907 kg = 2,000 lbs

Our methodology for determining our reserves is subject to change and is based upon estimates and assumptions made by management regarding a number of factors as noted above in this section. Cost per tonne and cut-off grade per operation are as follows.

Operations gold	Underground Operations		Surface and Massive Mining	
	Cut-off grade (cmg/t)	Cut-off cost (R/Tonne)	Cut-off grade (g/t)	Cut-off cost (R/Tonne)
South Africa Underground				
Bambanani	1,799	3,479	—	—
Joel	800	1,674	—	—
Masimong	906	1,670	—	—
Phakisa	790	2,104	—	—
Target 1	—	—	3.80	1,924
Tshepong	650	1,922	—	—
Unisel	868	1,708	—	—
Doornkop	680	1,781	—	—
Kusasalethu	795	2,164	—	—
South Africa Surface				
Kalgold	—	—	0.54	242
Free State Surface	—	—	0.17	47
	Cut-off grade (%Cu)	**Cut-off cost (A$/Tonne)**	**Cut-off grade (g/t)**	**Cut-off cost (A$/Tonne)**
Papua New Guinea				
Hidden Valley	—	—	0.91	32.5
Hamata	—	—	0.91	32.5
Golpu	0.2	22.0	—	—

Operations silver and copper	Underground Operations		Surface and Massive Mining	
	Cut-off grade (%Cu)	Cut-off cost (A$/Tonne)	Cut-off grade (g/t)	Cut-off cost (A$/Tonne)
SILVER				
Papua New Guinea				
Hidden Valley	—	—	0.91	32.5
COPPER				
Papua New Guinea				
Golpu	0.2	22.0	—	—

Notes on Cut-off:

1) Surface and massive mining are stated in g/t (g/t is grams of metal per tonne of ore).
2) All SA underground operations are stated in cmg/t (cmg/t is the Reef Channel width multiplied by the g/t which indicates the gold content within the Reef Channel).

Notes on Cut-off cost:

Cut-off cost refers to the cost in R/Tonne or A$/Tonne to mine and process a tonne of ore.

Notes on Copper:

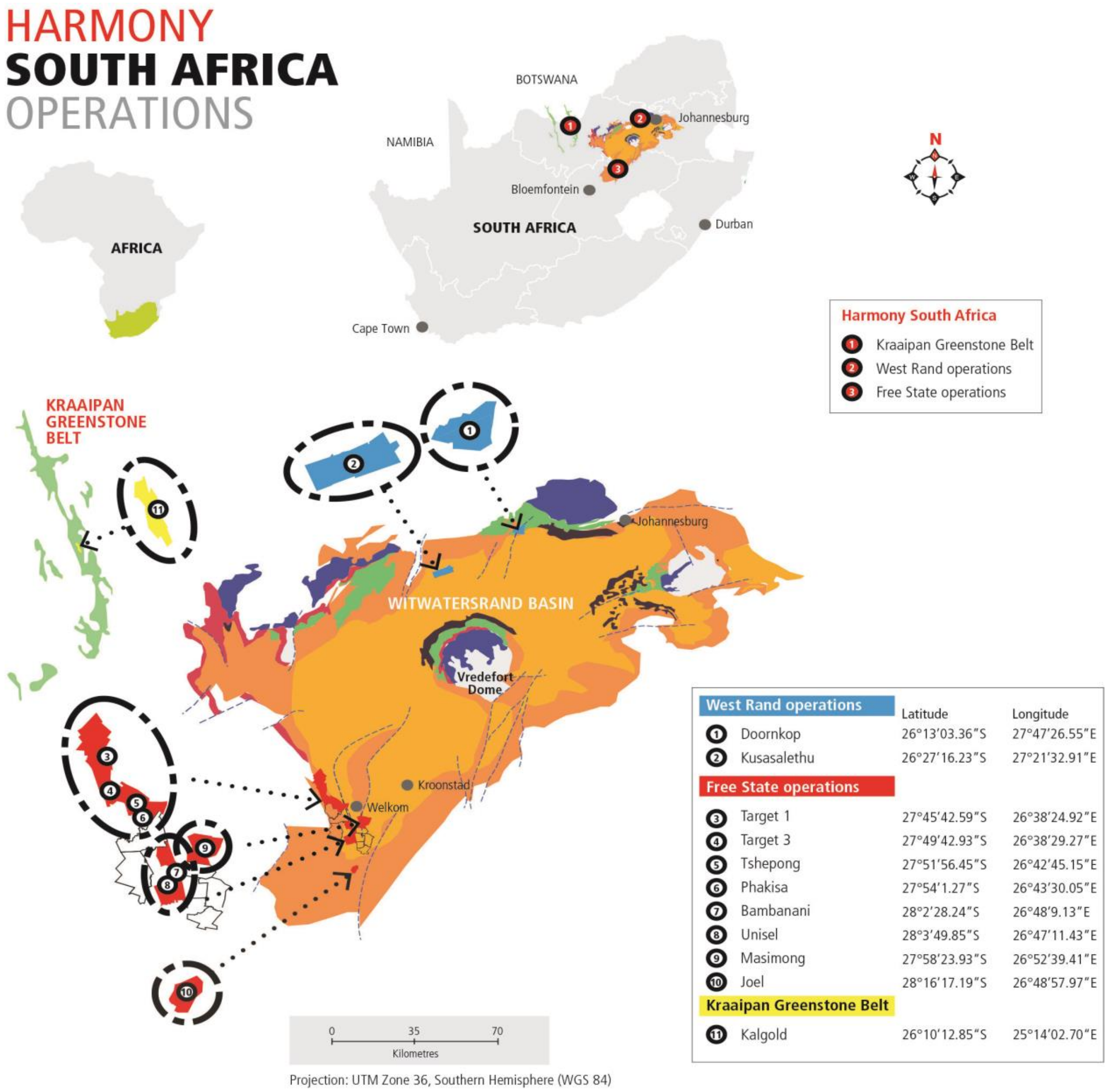
Cut-off is stated in % Cu.

Notes on Golpu:

Cut-off is based on 0.2% copper; molybdenum and gold mined as by-product.

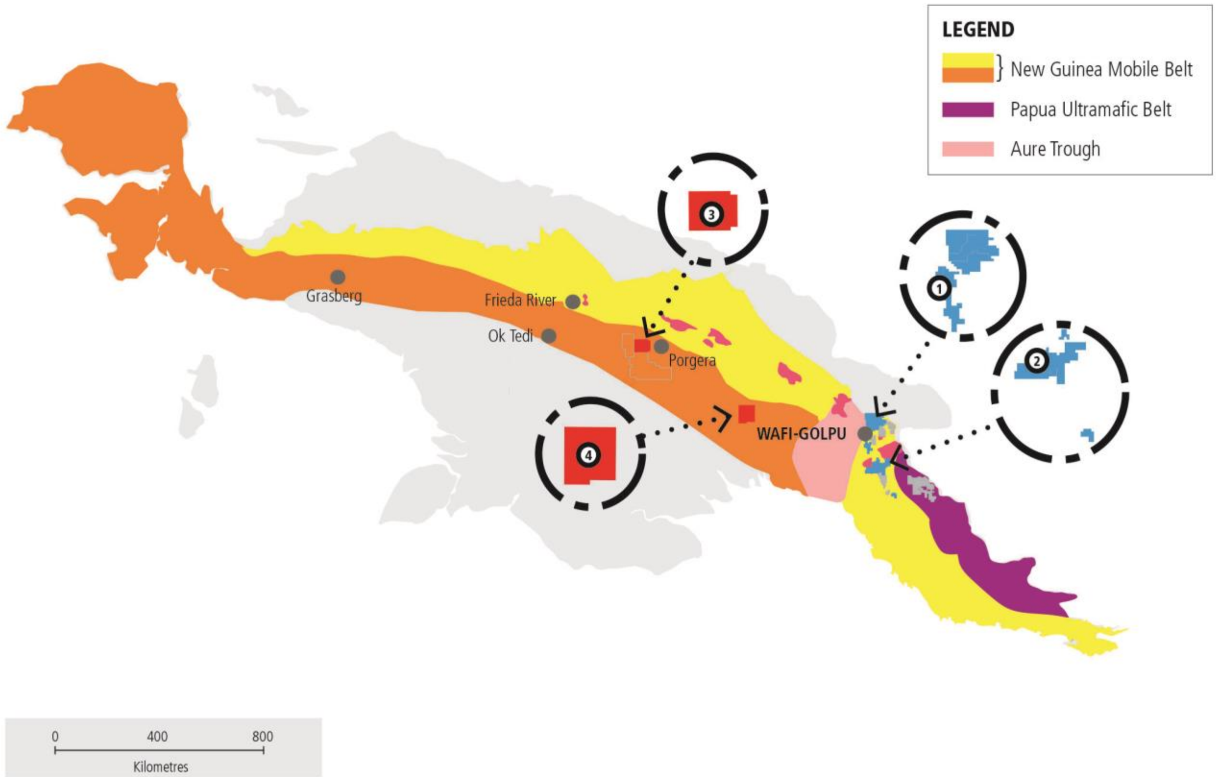
Worldwide Operations

The following is a map of our worldwide operations:



HARMONY
PAPUA NEW GUINEA
OPERATIONS

MMJV	Latitude	Longitude
① Wafi	146°27'09.57"	6°51'49.68"
Golpu	146°27'59.43"	6°51'35.23"
② Hidden Valley	146°40'0.09"	7°27'55.00"
Harmony exploration projects		
③ Kili Teki	142° 42' 08"E	5° 23' 12"S
④ Poru	144° 17' 00"E	6° 22' 00"S



Projection: UTM Zone 54, Southern Hemisphere (WGS 84)

Geology

The major portion of our South African gold production is derived from mines located in the Witwatersrand Basin in South Africa. The Witwatersrand Basin is an elongated structure that extends approximately 300 kilometers in a northeast-southwest direction and approximately 100 kilometers in a northwest-southeast direction. It is an Archean sedimentary basin containing a six kilometer thick stratigraphic sequence consisting mainly of quartzites and shales with minor volcanic units. The majority of production is derived from auriferous placer reefs situated at different stratigraphic positions and at varying depths below the surface in three of the seven defined goldfields of the Witwatersrand Basin.

Our Hidden Valley project comprises low sulphidation carbonate-base metal-gold epithermal deposits within the Morobe Goldfield, in the Morobe Province of PNG. In the Hidden Valley project area, a batholith of Morobe Granodiorite (locally a coarse grained monzogranite) is flanked by fine metasediments of the Owen Stanley Metamorphics. Both are cut by dykes of Pliocene porphyry ranging from hornblende-biotite to feldspar-quartz porphyries. A number of commonly argillic altered and gold anomalous breccias are known, including both hydrothermal and over printing structural breccias. The Hidden Valley deposit is hosted in the Moribe Granodiorite, dominated by a series of post-Miocene faults, both north and north-west trending, control the gold mineralization.

Our Wafi project comprises the sedimentary/volcaniclastic rocks of the Owen Stanley Formation that surround the Wafi Diatreme and host the gold mineralization. Gold mineralization occurs associated with an extensive zone of high-sulphidation epithermal alteration overprinting porphyry mineralization and epithermal style vein-hosted and replacement gold mineralization with associated wall-rock alteration. The Golpu Copper-Gold project is located about one kilometer northeast of the Wafi gold orebody. It is a porphyry (diorite) copper-gold deposit. The host lithology is a diorite that exhibits a typical zoned porphyry copper alteration halo together with mineralization in the surrounding metasediment. The mineralized body can be described as a porphyry copper-gold “pipe”. The Wafi gold mineralization and alteration partially overprints the upper levels of the Golpu porphyry copper-gold mineralization.

Operations Recently Placed on Care and Maintenance

Target 3

Target 3 (previously Loraine 3) and Freddies 7 & 9 shafts were acquired from Pamodzi Gold Free State (Proprietary) Limited (In Liquidation) (“**Pamodzi FS”)** in February 2010. Target 3 is situated near the town of Allanridge in the Free State Province, some 270 kilometers southwest of Johannesburg. Located on the northern limit of the Welkom Goldfields, the site is accessed via the R30 motorway situated between the towns of Bothaville and Welkom.

Geology: At Target 3 Shaft there remains a mix of remnant ore blocks including shaft pillar blocks where scattered mining can be exploited, and a number of areas of virgin ground where conventional mining can take place, with the potential to exploit zone 3 in the Freddies 9 Shaft area.

The gold mineralization exploited by Target 3 is contained within the Basal Reef, B Reef, A Reef (Kimberly Formation) and Elsburg Reef, a succession of Elsburg a pebble conglomerate reefs hosted by the Van Heeverrust (Eldorado Formation). Synclinal fold forms the major structural feature and is manifested as an asymmetric syncline whose axis trends N 15° W, with a general plunge of 10—12° north.

The Target 3 Shaft orebody has characteristics that suit massive mining techniques in the Eldorados which enable design to be centered on a mechanized operation.

Mining operations: During fiscal 2015 the operation was placed on care and maintenance. This decision was taken based on the financial performance of the operation and the future capital that was required to extend the life of the mine.

Production analysis:

	Fiscal Year Ended June 30,		
	2016[(1)]	**2015[(1)]**	**2014**
Target 3			
Production			
Tons ('000)	—	99	331
Recovered grade (ounces/ton)	—	0.156	0.137
Gold produced (ounces)	—	15,529	45,429
Gold sold (ounces)	—	16,140	45,301
Results of operations ($)	—		
Product sales ('000)	—	19,432	58,788
Cash cost ('000)	—	(14,870)	(53,856)
Inventory movement ('000)	—	(603)	60
Production profit ('000)	—	3,959	4,992
Cash costs			
Per ounce of gold produced ($)	—	958	1,185
All-in sustaining cost			
Per ounce of gold sold ($)	—	1,114	1,514
Capex ('000) ($)	—	1,785	12,385

(1) Placed on care and maintenance in October 2014, therefore no discussion has been included for fiscal 2016 and fiscal 2015.

Tonnages milled decreased from 355,000 tons in fiscal 2013 to 331,000 tons in fiscal 2014. This was due to environmental conditions (unable to develop sub-shaft areas) and erratic grades in secondary reefs and complex geology necessitating many unplanned crew moves. The erratic grades in secondary reefs in which more than 70% of mining on Target 3 and hanging wall / footwall conditions in Basal and B-Reefs resulted in the decrease in recovery grade from 0.147 ounces per ton in fiscal 2013 to 0.137 ounces per ton in fiscal 2014. In fiscal 2014 ounces produced decreased by 13% to 45,429 ounces, primarily as a result of a decrease in recovered grade and tons generated. The average tons milled in fiscal 2014 was 27,580 tons per month, compared with 29,583 tons per month in fiscal 2013.

Revenue decreased to US$58.8 million in fiscal 2014 as a result of the decrease in ounces produced. Cash costs per ounce increased from US$1,116/oz in fiscal 2013 to US$1,185/oz in fiscal 2014. This was mainly due to a decrease in production. Cash costs for Target 3 was US$53.9 million in fiscal 2014, compared with US$58.3 million in fiscal 2013. Cash costs in Rand terms increased by 10% this increase was primarily attributed to an increase in electricity costs of 8% as well as an increase in contractor cost to rehabilitate the second escape to comply with safety standards and procedures, but was however negated in dollar terms due to the weakening of the Rand in fiscal 2014.

Regulation

Mineral Rights - South Africa

The MPRDA

The MPRDA is the primary legislation used to regulate the mining industry since it came into effect on May 1, 2004. The Department of Mineral Resources (the "**DMR**") is the national department tasked with implementing the MPRDA and regulating the mining industry. The MPRDA extinguished private ownership of mineral rights. The South African government's role as custodian of South Africa's mineral and petroleum resources was entrenched in system where the right to prospect and mine is granted by government through the Minister of Mineral Resources (the "**Minister**").

The principal objectives of the MPRDA are:

- to recognize the internationally accepted right of the South African government to exercise full and permanent sovereignty over all the mineral and petroleum resources within South Africa;
- to give effect to the principle of South Africa's custodianship of its mineral and petroleum resources;
- to promote equitable access to South Africa's mineral and petroleum resources to all the people of South Africa;
- to substantially and meaningfully expand opportunities for HDSAs including women, to enter the mineral and petroleum industry and to benefit from the exploitation of South Africa's mineral and petroleum resources;
- to promote economic growth and mineral and petroleum resources development in South Africa;
- to promote employment and advance the social and economic welfare of all South Africans;
- to provide security of tenure in respect of prospecting, exploration, mining and production operations;
- to give effect to Section 24 of the South African Constitution by ensuring that South Africa's mineral and petroleum resources are developed in an orderly and ecologically sustainable manner while promoting justifiable social and economic development; and
- to ensure that holders of mining and production rights contribute towards socio-economic development of the areas in which they are operating.

Owing to the change brought about by the MPRDA, provision for a transition from the old regime (in which the role of the South African government was regulatory in nature and in which the right to mine vested in the holder of the mineral rights) to the new regime (which provides for the South African government, acting through the Minister, to grant mining rights) has been made in the Transitional Provisions contained in Schedule II of the MPRDA (the "**Transitional Provisions**"). The Transitional Provisions provide for, among other things, the holders of then-existing "old order" mining rights to apply for the conversion of those old order rights into "new order" mining rights in accordance with the MPRDA within five years of May 1, 2004, or before the old order right expired, whichever was earlier.

Old order mining rights were converted into new order mining rights in accordance with the MPRDA provided that the holder of the old order right fulfilled the requirements specified in the MPRDA, its Regulations and the Revised Mining Charter. Upon conversion, or failure to convert within the specified time periods, the old order rights cease to exist. In the event that the old order right was converted, the new order mining right could have been converted for a period up to 30 years which period may be renewed for further periods, each of which may not exceed 30 years at a time. A mining right for which an application for renewal has been lodged shall, despite its stated expiry date, remain in force until such time as such application has been granted or refused.

In accordance with the MPRDA, the holder of a mining right must comply with the terms of the right, the provisions of the MPRDA, the environmental authorization (issued under the National Environmental Management Act, 107 of 1998 ("NEMA"), the mining work programme and the social and labor plan (the "**SLP**") approved as part of the right. The SLP relates to the obligations placed on the mining right holder to, among other things, train employees of the mine in accordance with prescribed training methodologies, achieve employment equity and human resource development in the mining company, improve housing and living conditions of employees and set up local economic development projects. Compliance with the provisions of the MPRDA, environmental authorization, mining work programme and SLP is monitored by submission of monthly, bi-annual and annual returns and reports by the holder of the right to the DMR in accordance with the provisions of the MPRDA and the right.

We have been working on our program of licensing since 2004, which involved the compilation of a mineral assets register and the identification of all of our economic, mineral and mining rights. We actively carry out mining and exploration activities in all of our material mineral rights areas. Accordingly, the change in regime to that contained in the MPRDA has not had a significant impact on our mining and exploration activities as we applied for and were granted conversion of all of our old-order mining rights into new order mining rights in terms of the MPRDA. Our strategy has been to secure all strategic mining rights on a region-by-region basis, which we have achieved as we have secured all "old mining rights" and validated existing mining authorizations. We now have to continue complying with the required monthly, annual and bi-annual reporting obligation to the DMR.

On May 31, 2013, a notice was published in the Government Gazette recording the Minister's intention to introduce the Mineral and Petroleum Resources Development Amendment Bill, 2013 (the **"MPRDA Bill"**) into Parliament. The Bill was introduced into Parliament on June 21, 2013. The DMR briefed the National Assembly's Portfolio Committee on Mineral Resources on July 30 and 31, 2013, however, the MPRDA Bill has not been assented to by the President and remains pending. There is a degree of uncertainty regarding the changes that will be brought about should the MPRDA Bill be made law and the MPRDA Bill raises some concerns as it relates to Harmony's business:

- *Concentration of rights*

  The MPRDA Bill seeks to amend the MPRDA to provide that the Minister must refuse to provide a mining right or an exploration right if this will result in a concentration of rights under the control of the applicant.

- *Ownership of tailings created before May 1, 2004*

  The MPRDA provides that historic tailings are not regulated in terms of the MPRDA; however, the MPRDA Bill purports to amend the MPRDA so as to render historic tailings subject to regulation under the MPRDA, resulting in the South African government gaining custodianship of historic tailings.

- *Mineral beneficiation*

  A key change is that the MPRDA Bill now makes it mandatory for the Minister to "initiate or promote the beneficiation of minerals and petroleum resources in the Republic of South Africa". The MPRDA Bill affords the Minister broad discretion over beneficiation, without providing any criteria under which such discretion should be exercised.

- *Issue of a closure certificate*

  The MPRDA Bill envisages that a rights holder will remain liable for environmental and associated damage caused by prospecting and mining operations, even after (and notwithstanding) the issue of a closure certificate by the Minister. This means that a rights holder will no longer be indemnified from liability after the issue of a closure certificate.

Harmony is, through the Chamber of Mines of South Africa, working closely with government to ensure that the MPRDA Bill is drafted to support continued investment in mining in South Africa.

The Mining Charter

The South African government has identified the South African mining industry as an industry in which significant BEE (increased participation by black South Africans) is required. One of the express objects of the MPRDA is to substantially and meaningfully encourage Historically Disadvantaged South Africans ("**HDSAs**"), including women, to enter the mineral and petroleum industries and to benefit from the exploitation of the nation's mineral and petroleum resources. Section 100 of the MPRDA provides that the Minister must, within six months from the date on which the MPRDA takes effect, develop a broad-based social empowerment charter. This sets the framework, targets and timetable for affecting the entry of HDSAs into the mining industry, and allow such South Africans to benefit from the exploitation of mining and mineral resources.

Mining right holders were initially required to comply with the Broad-Based Socio-Economic Empowerment Charter (the "**Original Mining Charter**") for effecting entry of HDSAs into the mining industry. Among other things, the Original Mining Charter required (i) each mining company to achieve a 15% HDSA ownership of mining assets within five years of the Mining Charter coming into effect and a 26% HDSA ownership of mining assets within 10 years of the Mining Charter coming into effect, (ii) the mining industry as a whole to agree to assist HDSA companies in securing finance to fund participation in an amount of R100 billion over the first five years and (iii) mining companies to spell out plans for achieving employment equity at management level with a view to achieving a baseline of 40% HDSA participation at executive management (board) level, senior management (executive committee) level core and critical skills, middle management level and junior management level and 10% participation by women in the mining industry, in each case within five years.

On September 13, 2010, the Minister published the Amendment of the Broad-Based Socio-Economic Empowerment Charter for the South African Mining and Mineral Industry (the "**Revised Mining Charter**") and an updated Scorecard in respect thereof. The Revised Mining Charter's addresses ownership, procurement and enterprise development, beneficiation, employment equity, human resources development, mine community development, housing and living conditions, sustainable development and growth of the mining industry and reporting (monitoring and evaluation).

BEE participation is an absolute requirement for the conversion of a mining right. Mining companies are required to achieve an effective HDSA ownership of 26% of mining companies. The Revised Mining Charter does provide for a maximum 11% HDSA equity offset where a mining company undertakes beneficiation activities in relation to the mineral it extracts and mining companies are required to (i) procure a minimum of 40% of capital goods, 70% of services and 50% of consumer goods from HDSA suppliers (i.e. suppliers in which a minimum of 25% + 1 vote of their share capital must be owned by HDSAs) by 2014 (exclusive of non-discretionary procurement expenditure); (ii) ensure that multinational suppliers of capital goods contribute a minimum of 0.5% of their annual income generated from South African mining companies into a social development fund from 2010 towards the socio-economic development of South African communities; (iii) achieve a minimum of 40% HDSA demographic representation by 2014 at executive management (board) level, senior management (executive committee) level, core and critical skills, middle management level and junior management level, (iv) invest up to 5% of annual payroll in essential skills development activities and (v) implement measures to improve the standards of housing and living conditions for mineworkers by converting or upgrading mineworkers' hostels into family units, attaining an occupancy rate of one person per room and facilitating home ownership options for all mineworkers in consultation with organized labor, all of which must be achieved by 2014.

In addition, mining companies are required to monitor and evaluate their compliance with the Revised Mining Charter and must submit annual compliance reports to the DMR. The Scorecard attached to the Revised Mining Charter makes provision for a phased-in approach for compliance with the above targets over the five year period ended in 2014. For measurement purposes, the Scorecard allocates various weightings to the different elements of the Revised Mining Charter. Failure to comply with the provisions of the Revised Mining Charter will amount to a breach of the MPRDA and may result in the cancellation or suspension of a mining company's existing mining rights.

December 2014 marked the end of the five-year period of implementation of the Revised Mining Charter and, as such, all targets must have been achieved by the end of calendar 2014. In March 2015, the DMR made an interim report of consolidated results of the self-assessment by reporting companies of compliance with the Mining Charter, reporting relatively broad compliance with the non-ownership requirements of the Revised Mining Charter. However, the DMR did not report the results of compliance with the HDSA ownership guidelines of the Mining Charter and noted that there is no consensus on certain applicable principles.

Harmony believes that it had complied with the requirements of the Revised Mining Charter. Harmony will continue to comply with the Revised Mining Charter until a new Charter is applicable. *See "*Integrated Annual Report for the 20-F 2016—*Harmony in Action—Mining Charter compliance scorecard"* on pages 78 to 80.

In March 2015, the Minister released the assessment of the mining industry's compliance with the Mining Charter. Following the release, on April 15, 2016 the Minister published the Broad Based Black Economic Empowerment Charter for the South African Mining and Minerals Industry ("**draft Mining Charter"**). The draft Mining Charter is still in draft form and may be subject to change, however, we note that:

- the targets set in the Revised Charter have all been heightened and more stringent compliance requirements have been proposed;
- as was the case with its predecessors, the draft Mining Charter contains six elements with which mining companies are expected to comply. In addition, an updated weighted scorecard has been included, however, that the Ownership, Housing and Living Conditions and Human Resource Development elements are now "**Ring Fenced Elements**", which means that mining companies must ensure strict compliance with these elements at all times. The Employment Equity, Procurement and Supplier Development and Mine Community Development elements are each weighted;
- existing right holders are given a maximum of three years from the effective date of the draft Mining Charter, to comply with the revised targets set out therein;
- the draft Mining Charter seeks to align itself with the Revised Codes of Good Practice on Black Economic Empowerment, 2013 published under the Broad-Based Black Economic Empowerment Act (Act 53 of 2003 ("**BBBEE Act**"). this is, however, done in an opaque fashion, as it relates only to the scorecard and ignores the important discrepancies in the manner that ownership by HDSAs is measured; and
- rights holders who have not complied with the Ring Fenced Elements and who fall below a 50% compliance level on the weighted scorecard are said to be in breach of the MPRDA.

Harmony notes the difference of opinion in how some BEE transactions are recognized and the applicability of the "*once empowered, always empowered principle*". To this end, the DMR and the mining industry have agreed to jointly seek a 'declaratory order' from a South African court to determine whether the "*once empowered, always empowered principle*" is applicable to the BBE component of the Mining Charter. This is a proactive and necessary step to promote regulatory certainty for the mining industry and will be fundamental to the implementation of the draft Mining Charter.

The Royalty Act

The Mineral and Petroleum Royalty Act 28 of 2008 and the Mineral and Petroleum Royalty Administration Act 29 of 2008 were assented to on November 21, 2008 with the commencement date set as May 1, 2009. However, the date on which royalties became payable was deferred to March 1, 2010. Royalties are payable by the holders of mining rights to the government according to formula based on earnings before interest and tax. This rate is then applied to revenue to calculate the royalty amount due, with a minimum of 0.5% and a maximum of 5% for gold. For 2016, the average royalty rate for our South African operations was 0.8% of gross sales.

The Davis Tax Committee also released a report on the determination of royalties for mining comments. This report proposed no changes to the royalty regime even though a number of amendments have recently been introduced dealing with the payment of mining royalties. Effectively the intention is to treat the payment similar to the determination of provisional tax on the basis that payments must effectively be made on a six-monthly basis. It is possible that there may be more than two payments if an estimate provided by a taxpayer is adjusted. Penalties may also be levied as a result of underestimation and not on the underestimation as such.

The BBBEE Act and the BBBEE Amendment Act

The BBBEE Act, which came into effect on April 21, 2004, established a national policy on broad-based black economic empowerment with the objective to (i) remedy historical racial imbalances in the South Africa economy and (ii) achieve economic transformation, by increasing the number of black people who participate in the mainstream South African economy. The BBBEE Act provides for various measures to promote BEE, including empowering the Minister of Trade and Industry to issue the BBBEE Codes, with which organs of state and public entities and parties interacting with them or obtaining rights and licenses from them would be required to comply. The BBBEE Codes were first published in 2007, and were revised in 2013 (although the revisions only came into effect in 2015). The BBBEE Codes sought to provide a standard framework, in the form of a "generic scorecard", for the measurement of BBBEE across all sectors and industries operating within the South African economy and sought to regularize such sectors and industries by providing clear and comprehensive criteria for the measurement of BBBEE.

On October 24, 2014, the BBBEE Amendment Act, No. 46 of 2013 (the "**BBBEE Amendment Act**") came into effect. The BBBEE Amendment Act inserted a new provision in the BBBEE Act, whereby the BBBEE Act would trump the provisions of any other law in South Africa which conflicts with the provisions of the BBBEE Act, provided such conflicting law was in force immediately prior to the effective date of the BBBEE Amendment Act. The BBBEE Amendment Act also stipulates that this provision would only be effective one year after the BBBEE Amendment Act is brought into effect, on October 24, 2015. On October 27, 2015, the Minister for Trade and Industry published a government gazette notice declaring an exemption in favor of the DMR from applying the requirements contained in section 10(1) of the BBBEE Act for a period of 12 months. There has been some debate as to whether or to what extent the mining industry was subject to the BBBEE Act and the policies and codes provided for thereunder. The BBBEE Codes apply in the absence of sector specific codes which have been agreed to by interested and affected parties active within a specific sector. By way of background, various sectors within the South African economy may negotiate and agree Codes of Good Practice which would govern transformation in that specific sector. In addition, certain codes fall outside of the regulatory framework established by the BBBEE Act and Codes promulgated by the Minister of Trade and Industry thereunder. One such sector is the mining industry, where the Mining Charter governs the implementation of BBBEE, among other things, within the mining industry. For purposes of the BBBEE Act, the Mining Charter is not a Sector Code. It is not clear at this stage how the Mining Charter and Code relate to each other. The government may designate the Mining Charter as a Sector Code, in which case it will be under the auspices of the BBBEE Act. On the other hand, the Mining Charter may remain a stand-alone document under the auspices of the MPRDA and may be subject to the trumping provision discussed above. This uncertainty may be resolved through either government clarification or judicial attention. The exemption by Minister for Trade and Industry can be read as confirmation that the Department of Trade and Industry regards the BBBEE Codes as "applicable" to the Mining Industry after the exemption is lifted on October 27, 2016. On February 17, 2016, the Minister of Trade and Industry published a gazette notice which repealed and confirmed the validity of a number of Sector Codes. The omission of the Mining Charter from the notice can be interpreted as confirmation that the Mining Charter is not contemplated as a Sector Code. This supports the interpretation BBBEE Act did not intend to trump the Mining Charter. While it remains to be seen how this will be interpreted, it appears that the BBBEE Act and the BEE Codes will not overrule the Mining Charter in the future and, in any event, our view is that the DMR is likely to continue implementing the Mining Charter and it is unlikely that the DMR will begin applying the BBBEE Act and BBBEE Codes in administering the MPRDA.

Mineral Rights - Papua New Guinea

According to the Mining Act of 1992 (PNG) mineral rights in PNG belong to the PNG government and, subject to the Act, all land is available for exploration and mining. The PNG government issues and administers mining tenements under the relevant mining legislation and regulations, and mining companies must pay royalties to the PNG government based on production. The Mining Act is administered by the Mineral Rights Authority, within the Department of Mining.

Mining tenements include:

- exploration licenses, issued for a term not exceeding two years, renewable for further two year terms subject to compliance with expenditure and other conditions. Each license contains a condition conferring on the PNG government the right to make a single purchase up to 30% equitable interest in any mineral discovery under the license at a price pro rata to the accumulated exploration expenditure
- mining leases, issued for a term not exceeding 20 years, renewable on application subject to compliance with issue conditions
- special mining leases, issued for a term not exceeding 40 years, renewable on application subject to compliance with issue conditions
- mining easements; and
- leases for mining purposes.

These tenements generally confer exclusive rights on the holder to exercise their rights thereunder. The key difference in PNG is that citizens have the right to carry out non-mechanized mining of alluvial minerals on land owned by them, provided that an alluvial mining lease is obtained.

Almost all land in PNG is owned by a person or group of persons under customary ownership, and is not generally overlaid by landowner title. There is often considerable difficulty in identifying landowners of a particular area of land because land ownership may arise from both contract and inheritance, and because of the absence of a formal written registration system.

Prior to commencing exploration, compensation for loss or damage must be agreed with the landowners. Prior to commencing mining, a written agreement must be entered into with landowners dealing with compensation and other matters.

In PNG, a mining legislative and tax regime review has been commissioned whereby various PNG government agencies are involved in the process. The policies and legislation being reviewed are the Mining Act 1992, Mining Safety Act 1997, Mineral Policy and sector policies including offshore mining policy, sustainable development policy, involuntary relocation policy and mine closure policy. The Chamber of Mines and Petroleum of PNG as the representative industry body has been collating information from industry participants regarding the review of current legislation and policy as part of the response to the government's mining legislation review. Harmony is represented on the chamber's sub-committee and is actively participating in discussions

In PNG, Harmony's wholly-owned subsidiary, Morobe Consolidated Goldfields Limited holds a 50% share in a mining lease for the Hidden Valley mine, together with its partner in the Hidden Valley Joint Venture, Newcrest PNG 1 Limited, which holds the other 50% share. Both parties have obligations under a memorandum of agreement with the PNG government, local government and the landowners.

Similarly, in the Wafi-Golpu Project, Harmony's wholly–owned subsidiary, Wafi Mining Limited holds a 50% share in various exploration licenses, together with its partner in the Wafi-Golpu Joint Venture, Newcrest PNG 2 Limited, which holds the other 50% share. Both companies have entered into compensation agreements with landowners on its exploration licenses.

There has been a significant rationalization of Harmony's (100%) tenement holding in PNG since fiscal 2014 and Harmony now manages two main project areas, which include the Tari and Poru projects in the Southern Highlands.

Health and Safety – South Africa

For many years, the safety of persons working in South African mines and quarries was controlled by the Mines and Works Act of 1956 and then by the Minerals Act of 1991 which was replaced by the Mine Health and Safety Act 29 of 1996 (as amended by the Mine Health and Safety Amendment Act, No.74 of 2008, the "**MHSA**"). The objectives of the MHSA are:

- to protect the health and safety of persons at mines;
- to require employers and employees to identify hazards and eliminate, control and minimize the risks relating to health and safety at mines;
- to give effect to the public international law obligations of South Africa that concern health and safety at mines;
- to provide for employee participation in matters of health and safety through health and safety representatives and the health and safety committees at mines;
- to provide effective monitoring of health and safety measures at mines;
- to provide for enforcement of health and safety conditions at mines;
- to provide for investigations and inquiries to improve health and safety at mines;
- to promote a culture of health and safety in the mining industry;
- training in health and safety in the mining industry; and
- co-operation and consultation on health and safety matters between the South African, employers, employees and their representatives.

One of the most important objectives of the MHSA is to protect the health and safety of all persons at mines and not merely the health and safety of employees. An employer is obliged, in terms of the MHSA and the regulations binding in terms thereof, to protect, as far as reasonably practicable, the health and safety of non-employees (such as visitors to a mine) and employees (which includes employees of independent contractors) performing work at a mine. The word "*employer*" in section 102 of the MHSA is defined as the owner of the mine. In turn, an "*owner*" of a mine is defined to include: (i) the holder of the prospecting permit or mining authorization issued under the MPRDA; (ii) if a prospecting permit or mining authorization does not exist, the person for whom the activities in connection with the winning of a mineral are undertaken, but excluding an independent contractor; or (iii) the last person who worked the mine or that person's successor in title.

The aforesaid subsection was amended by section 30(f) of the Mine Health and Safety Amendment Act, No. 74 of 2008 by substituting the term "*Mineral and Petroleum Resources Development Act*" for the term "*Minerals Act*." Under the new system, mining authorizations do not exist. However, taking into account section 12 of the Interpretation Act, No. 33 of 1957, the word "*authorisation*" must be substituted by the words "*mining right or mining permit*." Accordingly, the holder of the "*mining right or mining permit*" is regarded the employer for the purposes of the MHSA and the regulations binding thereunder. The employer therefore remains responsible to ensure that applicable provisions of the MHSA and the regulations binding in terms thereof are complied with to ensure the health and safety of persons, as far as reasonably practicable and to prevent damage to property.

The MHSA prescribes general and specific duties for employers and others, determines penalties and a system of administrative fines, and provides for employee participation by requiring the appointment of health and safety representatives and the establishment of health and safety committees. It also entrenches the right of employees to refuse to work in dangerous conditions.

See "Integrated Annual Report for the 20-F 2016—Harmony in Action—Safety and health" on pages 36 to 47.

The Mine Health and Safety Inspectorate ("**MHSI**") within the DMR is responsible for the enforcement of the MHSA and the regulations binding in terms thereof and it also plays an important role in the promotion of health and safety at mines. The MHSI comprises of a Chief Inspector of Mines, Principal Inspectors of Mines for each region and various Inspectors of Mines for each region. Should employers or employees fail to comply with their obligations under the MHSA the MHSI may take a number of enforcement measures which include the following.

- the issuing of statutory instructions (for example notices in terms of section 54 or section 55 of the MHSA) if an Inspector of Mines has reason to believe that any occurrence, practice or condition at a mine endangers the health and safety of any person at a mine, alternatively if an Inspector of Mines has reason to believe that a provision of the MHSA has not been complied with. A notice in terms of section 54 of the MHSA may halt all mining operations undertaken at a mine or part thereof. If a mine receives notices in terms of section 54 of the MHSA regularly, the production stoppages and the additional costs incurred as a result thereof, will not only effect the production results of a mine but also the reputation and business of a mine. If, however, a notice in terms of section 54 of the MHSA has been issued unlawfully, the mine may appeal the said notice to the Chief Inspector of Mines. It must be noted that the aforesaid appeal does not suspend the operation of the notice issued in terms of section 54 of the MHSA. To suspend the operation of the notice in the above instance, a mine may lodge an urgent application to the Labour Court (being the court with jurisdiction) requesting the suspension of the operation of the notice issued in terms of section 54 of the MHSA pending the outcome of the appeal to the Chief Inspector of Mines;

- the Chief Inspector of Mines may suspend or cancel certificates of competency issued in terms of the MHSA if the holder of that certificate is guilty of gross negligence or misconduct or has not complied with the MHSA or the regulations binding thereunder;
- a Principal Inspector of Mines may recommend prosecution to the National Director of Public Prosecutions if satisfied that there is sufficient admissible evidence that an offence has been committed. Any person convicted of an offence in terms of the MHSA may be sentenced to a fine or imprisonment as may be prescribed;
- a Principal Inspector of Mines may, after considering the recommendation of an Inspector of Mines and the written representations of the employer, impose an administrative fine for the failure to comply with, amongst others, the provisions of the MHSA and the regulations binding thereunder. In terms of Schedule 8 to the MHSA, the maximum administrative fine which may be imposed on an employer is one million ZAR per transgression. The MHSA does not make provision for any internal appeal against an administrative fine which has been issued unlawfully. However, if a mine receives an administrative fine which has been issued unlawfully, the mine may lodge an application in the Labour Court (being the court with jurisdiction) to review the decision of the Chief Inspector of Mines to impose an administrative fine.

In addition to the aforesaid and in terms of section 92 of the MHSA, an owner which has been convicted of an offence in terms of section 86 of the MHSA may be sentenced to “the withdrawal or suspension of the permit” (see section 92(6)(a) of the MHSA). Over and above the aforesaid, investigation and/or inquiry proceedings in terms of the MHSA are instituted by the MHSI following the occurrence of any accident or incident at a mine, which results in the death of any person.

Health and Safety – Papua New Guinea

PNG has a significant mining industry, and a developing system of occupational health and safety. The PNG Mining (Safety) Act of 1977 is the principal legislation, which addresses a range of issues such as working hours, minimum safety and reporting requirements. Other legislation and regulations also apply. The PNG Mining (Safety) Act and Regulations are currently under review as part of the overall review of mining legislation in PNG.

See “Integrated Annual Report for the 20-F 2016—Harmony in Action—Safety and health” on pages 36 to 47.

Laws and Regulations pertaining to Environmental Protection – South Africa

The following is an overview of the South African environmental laws and regulations which are relevant to our operations in South Africa.

Four major pieces of legislation presently account for the majority of environmental management of mining operations in South Africa and are discussed in turn below. They are:

- NEMA;
- The National Water Act, 36 of 1998 ("**NWA**");
- The National Environmental Management: Air Quality Act, 39 of 2004 ; and
- The National Environmental Management: Waste Act, 59 of 2008 ("**Waste Act**").

South African environmental legislation commonly requires businesses whose operations may have an impact on the environment to obtain permits, authorizations and other approvals for those operations. The rationale behind this is to ensure that companies with activities that are reasonably expected to have environmental impacts, can initially assess the extent of the environmental impacts from such activities, as well as to put reasonable and practicable mitigation measures in place to manage these impacts.

NEMA

NEMA is the overarching legislation giving effect to the environmental right protected in section 24 of the Constitution of the Republic of South Africa, 1996, and which provides the underlying framework and principles underpinning the coordinated and integrated management of environmental activities. In terms of NEMA, an environmental authorization is required in order to commence a listed activity. These activities are currently listed in GNR 983-985 of December 8, 2014 ("**NEMA Listed Activities**"). The commencement of a listed activity without an environmental authorization may be rectified via a section 24G application for authorization, however, such application will be subject to payment of an administrative penalty and may attract other liability.

Depending on the anticipated severity of the impact of undertaking a listed activity, the application process will require either a basic assessment report ("**BAR**") or a scoping and environmental impact assessment report ("**S&EIR**") to be prepared as part of the application for an environmental authorization. An activity requiring a mining right is considered to have a more severe environmental impact and requires an S&EIR prior to commencement. This listed activity was previously listed in the listing notices published prior to 2014; however, it was never brought into effect. As a result there was legal debate about the applicability of NEMA listed activities to mining and related activities and whether activities which were incidental to mining triggered other related activities under NEMA. Previously the approval of an Environmental Management Programme ("**EMPR**") served a relatively similar function under the Mineral and Petroleum Resources Development Act 28, 2002 (Act 28 of 2002) ("**MPRDA**"). Clarity has since been brought about by virtue of a number of amendments to NEMA and the MPRDA, as well as the listed activities under NEMA and it is clear that as of December 8, 2014, an environmental authorization is required for the commencement of any activity which requires a mining right or the commencement of any activity which requires a prospecting right. The issue of an environmental authorization is a condition prior to the grant of a prospecting or mining right. The DMR is the responsible authority for the issuing of an environmental authorization; however, the Department of Environmental Affairs remains the appeal authority in respect of any appeals to the issue of an environmental authorization. Applicants are also required to follow stringent requirements in the public participation process to enable consultation with all interested and affected parties.

As part of its application for an environmental authorization the applicant must demonstrate that it has complied with the prescribed financial provisioning requirements in terms of section 24P of NEMA. This means that the holder must set provisioning rehabilitation of the mining activities for concurrent rehabilitation, rehabilitation upon closure and the costs of managing latent and residual post closure impacts. Moreover every holder of a mining right must assess his or her environmental liability on an annual basis and must increase his or her financial provision to the satisfaction of the Minister for Mineral Resources. The holder must also submit an audit report to the Minister on the adequacy of the financial provision from an independent auditor. The new financial provisions, regulations 2015 stipulate new procedures for how financial provision is to be made, audited and reviewed. Existing mines are also required to comply with the financial provision requirement, and are required to substantively review and align their financial provision in accordance with these regulations during the relevant transitional period, the long-stop date of which currently expires on February 20, 2017. Proposed amendments to the financial provision regulations (published on 9 September 2016) seek to extent this transitional period until February 20, 2018. These regulations have brought about a number of changes and clarifications to the previous legal regime, and they are likely to substantially increase the required quantum of financial provision set aside by existing operations, as well as the financial vehicles historically used by mining companies to put up these provisions. This is due to the qualification that latent or residual environmental impacts which may become known in the future now include the pumping and treatment of polluted or extraneous water. The mining industry has raised serious concerns about the intent of, and ability of the DMR to implement the new regulations. The proposed changes which have been published also seek to address some of the concerns that have been raised by the mining industry.

Lastly, NEMA imposes a statutory obligation on every person who has caused or is likely to cause significant contamination to take reasonable measures in relation thereto. This duty applies retrospectively to contamination caused prior to 1998. A failure to comply with this duty, as well as the requirement for an environmental authorization can result in significant fines of up to ZAR10 million and/or 10 years imprisonment being imposed. Directives or compliance notices can also be issued under NEMA for the temporary or permanent shut down of facilities at a mining operation or the entire mining operation. Directors and certain employees can also be held criminally liable for environmental offences in their personal capacity under NEMA if they fail to take reasonable measures to protect the environment.

Waste management

In relation to mining waste specifically, the Waste Act has recently been amended so as to apply to residue stockpiles and deposits and to prescribe certain management measures in respect thereof. A waste management license is now required for the establishment or reclamation of a residue stockpile or residue deposit resulting from activities which require a prospecting right or mining permit. This requirement only applies to facilities established or reclaimed after July 24, 2015. It does not apply retrospectively to existing stockpiles and deposits as the relevant transitional provisions (albeit drafted ambiguously) appear to suggest that if they were authorized in an EMPR in terms of the MPRDA prior to July 24, 2015, they will be considered lawful or authorized for the purposes of the Waste Act. Other waste management facilities constructed and/or operated by our operations may also be subject to licensing requirements, including hazardous waste disposal sites and central salvage yards.

In addition to licensing, mines must also comply with the management measures prescribed for residue stockpiles and deposits in the Regulations for Residue Stockpiles and Residue Deposits from a Prospecting, Mining, Exploration or Production Operation in GNR 632 of July 24, 2015. These regulations do not retrospectively apply to existing stockpiles and deposits, so long as they are in an approved EMPR. These regulations have notable cost implications for new residue stockpiles and deposits established after this date as they impose certain liner/barrier requirements for them.

As of May 2014, the Waste Act also regulates contaminated land, whether or not the contamination occurred before the commencement of the Waste Act or at a different time from the actual activity that caused the contamination. Consequently, historic, as well as present or future arising, contaminated land which is identified as an investigation area by the environmental authorities or which is notified as being contaminated by the land owner must be assessed and reported on. The direction of taking monitoring and management measures, or of undertaking site remediation, may follow depending on the level of risk associated with the contamination.

Water use and pollution

South Africa's water resources are regulated by the NWA. The NWA has provisions governing the prevention and remediation of pollution, and provides for a liability regime similar to that of NEMA, as well as licensing requirements. Most mining operations require a water use license in order to conduct their operations, particularly for activities relating to water abstraction, storage, effluent discharge, diversions, and facilities which have the potential to pollute groundwater resources. Water use licenses are difficult to obtain and usually involve a lengthy and delayed application process. Mines are also required to comply with the regulations which were specifically published for the use of water for mining and related activities in GN 704 of June 4, 1999. These regulations provide for limitations on the location of mining infrastructure and requirements for separation of dirty and clean water systems and the design of certain water management infrastructure.

Labor Relations

South Africa

Employee relations in South Africa are guided by the Labour Relations Act as well as by company and mine-based recognition agreements. In South Africa, Harmony recognises four labour unions. As at financial year-end, these unions and their corresponding representation were as follows, namely the National Union of Mineworkers (at 60%); the Association of Mineworkers and Construction Union (at 24%); the United Association of South Africa (at 8%) and Solidarity (at 2%). About 94% of our South African workforce is unionised, with the balance not belonging to a union. See *"Integrated Annual Report for the 20-F 2016—Harmony in Action—Employees and communities"* on page 51.

Australia

Employee relations in Australia are regulated by a combination of federal and state statutes that stipulate minimum standards and provide for collective bargaining and action. All employment contracts are based on the Fair Work Act of 2009 and the National Employment Standards. Our Australian workforce is not unionized.

Papua New Guinea

Employee relations in PNG are regulated by the Employment Act of 1978 (PNG) and the Employment of Non-Citizens Act 1978 (PNG). Individual contracts are entered into, and the workforce is not unionized.

In PNG, wages are guided by independent market research that compares mining, oil and gas companies in the region. Industrial relations at Hidden Valley have been established through regular dialogue between management and employees via the Employee Relations Committee. Employees at PNG are not unionized, however, Hidden Valley Mine employment is guided by a MOA between the Landowner Association, the Company and the government. The MOA governance process requires that, when qualifications and experience are equivalent, employment preference is given to local and landowner candidates before individuals from other provinces or countries. Compliance with this agreement is a critical issue in maintaining Hidden Valley Mine's license to operate.

C. ORGANIZATIONAL STRUCTURE

The information set forth under the heading:

- *"—Who we are"* on page 5

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference. Also see note 2.1 "Consolidation" of our consolidated financial statements, set forth beginning on page F-1.

D. PROPERTY, PLANT AND EQUIPMENT`

The information set forth under the headings:

- *"—Harmony in Action—Environmental performance"* on pages 59 to 77;
- *"—Harmony in Action—Operational performance"* on pages 81 to 109;

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference. Also see note 13 "Property, Plant and Equipment" and note 29 "Cash Generated by Operations" of our consolidated financial statements, set forth beginning on page F-1.

Also see Item 4: "*Information on the Company—Business Overview——Reserves", "—Geology" and "—Capital Expenditures"* and Item 5: "*Operating and Financial Review and Prospects—Tabular Disclosure of Contractual Obligations"*.

ITEM 4A. UNRESOLVED STAFF COMMENTS

Not applicable.

ITEM 5. OPERATING AND FINANCIAL REVIEW AND PROSPECTS

You should read the following discussion and analysis together with our consolidated financial statements, including the related notes, set forth beginning on page F-1.

A. OPERATING RESULT

Overview

We are currently the third largest producer of gold in South Africa and are an important producer in PNG. Our gold sales for fiscal 2016 were 1.08 million ounces of gold. As at June 30, 2016, our mining operations and projects reported total proved and probable reserves of approximately 36.9 million gold equivalent ounces and in fiscal 2016 we processed approximately 20.3 million tons of ore.

For segment purposes, management distinguishes between "Underground" and "Surface", with each shaft or group of shafts or open-pit mine managed by a team (headed by a single general manager) being considered to be an operating segment.

Our reportable segments are as follows:

- Bambanani, Doornkop, Joel, Kusasalethu, Masimong, Phakisa, Target 1, Target 3 (operations were suspended and placed on care and maintenance during the December 2014 quarter), Tshepong, Unisel and Hidden Valley;
- all other shafts and surface operations, including those that treat historic sand dumps, rock dumps and tailings dams, are grouped together under *"Other — Underground*" and *"Other — Surface*".

Recent Accounting Pronouncements

Harmony's accounting policies are described in the notes to the consolidated financial statements set forth beginning on page F-1. Recently adopted accounting policies, as well as recent accounting pronouncements with the potential for impact on the consolidated financial statements, are described in note 2 "*Accounting Policies*" to our consolidated financial statements set forth beginning on page F-1.

Critical Accounting Policies and Estimates

The preparation of our financial statements in accordance with IFRS requires management to make estimates and assumptions that affect the reported results of our operations. Actual results may differ from those estimates. We have identified the most critical accounting policies upon which our financial results depend. Some of our accounting policies require the application of significant judgment and estimates by management in selecting the appropriate assumptions for calculating financial estimates. By their nature, these judgments are subject to an inherent degree of uncertainty and are based on our historical experience, terms of existing contracts, management's view on trends in the gold mining industry and information from outside sources.

Our significant accounting policies and critical accounting estimates and judgments are described in more detail in note 2 "*Accounting Policies*" and 3 "*Critical Accounting Estimates and Judgments*", respectively, to our consolidated financial statements set forth beginning on page F-1. This discussion and analysis should be read in conjunction with such consolidated financial statements and the relevant notes. Management has identified the following as critical accounting policies because estimates used in applying these policies are subject to material risks and uncertainties. Management believes the following critical accounting policies, together with the other significant accounting policies discussed in the notes to our consolidated financial statements, affect its more significant judgments and estimates used in the preparation of our consolidated financial statements and could potentially impact our financial results and future financial performance.

Gold mineral reserves

Gold mineral reserves are estimates of the amount of ounces that can be economically and legally extracted from the Group's properties. In order to calculate the gold mineral reserves, estimates and assumptions are required about a range of geological, technical and economic factors, including quantities, grades, production techniques, recovery rates, production costs, commodity prices and exchange rates.

Estimating the quantities and/or grade of the reserves requires the size, shape and depth of the orebodies to be determined by analyzing geological data such as the logging and assaying of drill samples. This process may require complex and difficult geological judgments and calculations to interpret the data. These reserves are determined in accordance with the SAMREC Code, JORC and SEC Industry Guide 7.

Because the economic assumptions used to estimate the gold mineral reserves change from year to year, and because additional geological data is generated during the course of operations, estimates of the mineral reserves may change from year to year. Changes in the proved and probable reserves may affect the Group's financial results and financial position in a number of ways, for example depreciation and amortization charged in the income statement may change as they are calculated on the units-of-production method.

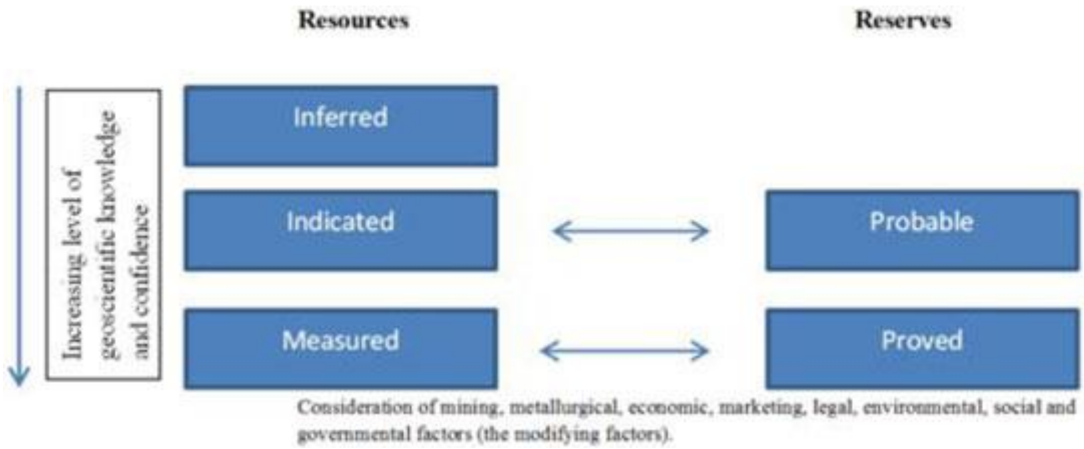
The estimate of the total expected future lives of our mines could be materially different from the actual amount of gold mined in the future. See Item 3: *"Key Information—Risk Factors—Estimations of Harmony's gold reserves are based on a number of assumptions, including mining and recovery factors, future cash costs of production and the price of gold. As a result, quantities of gold produced may differ from current estimates"*

Depreciation of Mining Assets

Depreciation of mining assets is computed principally by the units of production method over the life-of-mine, based on estimated quantities of economically recoverable proved and probable reserves, which can be recovered in future from known mineral deposits.

The preparation of consolidated financial statements in compliance with IFRS requires management to assess the useful life of each of its operations separately based on the characteristics of each deposit and select the reserve/resource base that best reflects the useful life of the operation. In most instances, management considers the use of proved and probable reserves for the calculation of depreciation and amortization expense to be the best estimate of the life of the respective mining operation. Therefore, for most of the Company's operations, we use proved and probable reserves only, excluding all inferred resources as well as any indicated and measured resources that have not yet been deemed economically recoverable.

In some instances, proved and probable reserves alone may not provide a realistic indication of the useful life of mine and related assets. In these instances, management may be confident that certain inferred resources will eventually be classified as measured and indicated resources, and if economically recoverable, they will be included in proved and probable reserves. Management is approaching economic decisions affecting the mine on this basis, but has not yet done the necessary development and geological drill work to improve the confidence to the required levels to designate them formally as reserves. In these cases, management, in addition to proved and probable reserves, may also include certain, but not all, of the inferred resources associated with these properties as the best estimate of the pattern in which the asset's future economic benefits are expected to be consumed by the entity.



Management only includes the proved and probable reserves and the inferred resources that have been included in the life-of-mine plan. To be included in the life-of-mine plan, resources need to be above the cut-off grade set by management, which means that the resource can be economically mined and is therefore commercially viable. This consistent systematic method for inclusion in the life-of-mine plan takes management's view of the gold price, exchange rates as well as cost inflation into account. The board of directors and management approach economic decisions affecting these operations based on the life-of-mine plans that include such resources. In declaring the resource, management would have had to obtain a specified level of confidence of the existence of the resource through drilling as required by the SAMREC Code or JORC. For further discussion on mineral reserves, see *"—Gold mineral reserves"* above.

During the periods presented, the Company added the inferred resources that were included in the life-of-mine plans at Doornkop and Masimong to the proved and probable reserves in order to calculate the depreciation expense. The depreciation calculation for all other operations was done using only the proved and probable reserves.

Both the Masimong and Doornkop operations were restructured during fiscal 2015 to address the low gold price and high input cost environment. At Masimong, orebody development, which would have concentrated on the inferred resource areas, has been scaled down significantly as a result and the expected life of mine reduced to three years in order to improve profitability by reducing costs and improving margins. The revised life-of-mine plan has resulted in the reduction of inferred resources included in the plan. During fiscal 2016, no additional inferred resources were identified at Masimong for inclusion in the life-of-mine plan.

In fiscal 2016, exploration at Doornkop proved successful with the inclusion of new mining areas in the updated life-of-mine plan for fiscal 2017. Further exploration, including a seismic study and development will be conducted in the next financial year to further enhance Doornkop's geological and orebody confidence.

At Doornkop, there has been a steady conversion of the inferred resources included in the life-of-mine plan into measured and indicated resources that are then classified as reserves if economically viable. In addition, there have been no instances during the periods presented where subsequent drilling or underground development indicated instances of inappropriate inclusion of inferred resources in the life-of-mine plan. As such, management is confident that the inclusion of the inferred resources included in the life-of-mine plan in calculating the depreciation charge is a better reflection of the pattern of consumption of the future economic benefits of these assets than would be achieved by excluding them.

Management's confidence in the economical recovery of these inferred resources is based on historical experience and available geological information. The surface drilling spread (surface boreholes) and underground advance drilling at Doornkop South Reef has indicated that the portion of the inferred resources included in the life-of-mine plan exist and can be economically mined with a high level of confidence in the orebodies. The surface boreholes have been used to determine the existence of the orebodies as well as the location of major geological structures and the mineralogy of the orebodies. However, since further drilling and underground development necessary to classify the inferred resources as measured and/or indicated resources and then as reserves, if economically recoverable, has not been done yet, they remain in the inferred resource category. Geological drilling can only be done as and when the underground infrastructure is advanced.

Additional confidence in existence and commercial viability is obtained from the fact that the orebodies surrounding these two operations have already been mined over many years in the past. We mine continuations of the same reefs that these mined-out operations exploited. At Doornkop South Reef, the geological setting of the orebody is such that there is an even distribution of the mineralized content, and reliance can be placed on the comparable results of the surrounding mines. As these results are already known, simulations and extrapolations of the expected formations can be done with a reasonable degree of accuracy. Although this information will not allow the classification of inferred resources to measured and indicated resources and then as a reserve if economically viable, it does provide management with valuable information and increases the level of confidence in existence and grade expectation.

Future capital expenditure necessary to access these inferred resources, such as costs to complete a decline or a level, has also been included in the cash flow projections for the life-of-mine plan and have been taken into account when determining the pattern of depreciation charge for these operations.

Due to the fact that the economic assumptions used to estimate the proved and probable reserves and resources change from year to year, and because additional geological data is generated during the course of operations, estimates of the resources and proved and probable reserves may change from year to year. Changes in the proved and probable reserves and the inferred resource base used in the life-of-mine plan may affect the calculation of depreciation and amortization. The change is recognized prospectively.

The relevant statistics for the two operations have been included below.

		Applicable to the Fiscal Year Ended June 30,		
		2016	**2015**	**2014**
Doornkop South Reef				
A	Years (life-of-mine plan)	15	18	17
B	Reserves (Tons million)	5.6	8.4	7.3
B	Resources (Tons million)	36.2	34.3	34.4
D	Total inferred resources (Tons million)	24.9	24.5	21.8
E	Inferred resources included in life-of-mine plan (Tons million)	4.2	9.6	14.3
F	Future development costs			
	• Rand million	173.3	269.0	226.0
	• US$ million	11.9	23.5	21.8
G	Depreciation expense for the fiscal year			
	• As reported (US$ million)	12.7	5.0	4.1
	• Excluding inferred resources (US$ million)	16.9	10.3	11.6

		Applicable to the Fiscal Year Ended June 30,		
		2016	2015	2014
Masimong				
A	Years (life-of-mine plan)	3	15	13
B	Reserves (Tons million)	2.1	7.3	9.1
B	Resources (Tons million)	15.1	75.5	109.6
D	Total inferred resources (Tons million)	5.7	58.2	82.3
E	Inferred resources included in life-of-mine plan (Tons million)	0.1	3.7	4.0
F	Future development costs			
	• Rand million	1.5	16.4	0.0
	• US$ million	0.1	1.4	0.0
G	Depreciation expense for the fiscal year			
	• As reported (US$ million)	17.7	4.5	3.9
	• Excluding inferred resources (US$ million)	18.6	6.1	6.9

Impairment of Property, Plant and Equipment

We review and evaluate our mining assets for impairment when events or changes in circumstances indicate the related carrying amounts may not be recoverable. An impairment loss is recognized for the amount by which the asset's carrying amount exceeds its recoverable amount. The recoverable amount is the higher of an asset's fair value less costs to sell and value in use. For the purposes of assessing impairment, assets are grouped at the lowest levels for which there are separately identifiable cash flows (cash generating units). Each operating shaft, along with allocated common assets such as plants and administrative offices, is considered to be a cash generating unit as each shaft is largely independent of the cash flows of other shafts and assets.

Future cash flows are estimated based on estimated quantities of recoverable minerals, expected commodity prices (considering current and historical prices, price trends and related factors), production levels and cash costs of production, capital and reclamation costs, all based on detailed life-of-mine plans. The significant assumptions in determining the future cash flows for each individual operating mine at June 30, 2016, apart from production cost and capitalized expenditure assumptions unique to each operation, included a gold price, silver price and exchange rate assumptions as follows:

	Fiscal year ended June 30, 2016
	Long term
US$ gold price per ounce	1,189
US$ silver price per ounce	17.80
Exchange rate (R/US$)	13.86
Exchange rate (PGK/US$)	3.10

The term "recoverable minerals" refers to the estimated amount of gold that will be obtained from proved and probable reserves and related exploration stage mineral interests, except for other mine-related exploration potential and Greenfields exploration potential discussed separately below, after taking into account losses during ore processing and treatment. Estimates of recoverable minerals from such exploration stage mineral interests are risk adjusted based on management's relative confidence in such materials. With the exception of other mine-related exploration potential and Greenfields exploration potential, estimates of future undiscounted cash flows are included on an area of interest basis, which generally represents an individual operating mine, even if the mines are included in a larger mine complex. In the case of mineral interests associated with other mine-related exploration potential and Greenfields exploration potential, cash flows and fair values are individually evaluated based primarily on recent exploration results and recent transactions involving sales of similar properties.

As discussed above under *"Gold mineral reserves"*, various factors could impact our ability to achieve our forecasted production schedules from proved and probable reserves. Additionally, gold prices, capital expenditure requirements and reclamation costs could differ from the assumptions used in the cash flow models used to assess impairment. The ability to achieve the estimated quantities of recoverable minerals from exploration stage mineral interests involves further risks in addition to those factors applicable to mineral interests where proved and probable reserves have been identified, due to the lower level of confidence that the identified mineralized material can ultimately be mined economically. Assets classified as other mine-related exploration potential and Greenfields exploration potential have the highest level of risk that the carrying value of the asset can be ultimately realized, due to the still lower level of geological confidence and economic modeling.

During fiscal 2016, we recorded a net reversal of impairment of property, plant and equipment of US$3 million, an impairment of US$285 million was recorded in fiscal 2015 and an impairment of assets of US$12 million was recorded in fiscal 2014. Material changes to any of these factors or assumptions discussed above could result in future impairment charges, particularly around future commodity price assumptions. A 10% decrease in commodity price assumptions at June 30, 2016 would have resulted in an additional impairment at Masimong of US$19 million and Hidden Valley of US$22 million. The decreases noted would have resulted in impairments at Doornkop of US$1 million (as opposed to the reversal of US$50.1 million), Free State Surface of US$10 million, Unisel of US$11 million and other Harmony assets of US$3.1 million. This analysis assumes that all other variables remain constant.

Carrying Value of Goodwill

We evaluate, on at least an annual basis, the carrying amount of goodwill to determine whether current events and circumstances indicate that such carrying amount may no longer be recoverable. For the purposes of assessing impairment, assets are grouped at the lowest levels for which there are separately identifiable cash flows (cash generating units). Each operating shaft, along with allocated common assets such as plants and administrative offices, is considered to be a cash generating unit as each shaft is largely independent of the cash flows of other shafts and assets. To accomplish this, we compare the recoverable amounts of our cash generating units to their carrying amounts. The recoverable amount is the higher of an asset's fair value less costs to sell and value in use. If the carrying value of a cash generating unit were to exceed its recoverable amount at the time of the evaluation, an impairment loss is recognized by first reducing goodwill, and then the other assets in the cash generating unit on a pro rata basis. Assumptions underlying fair value estimates are subject to risks and uncertainties. If these assumptions change in the future, we may need to record impairment charges on goodwill not previously recorded.

As at June 30, 2016 substantially all of our goodwill related to the Tshepong and Bambanani cash generating units. An impairment of US$123 million on goodwill relating to Phakisa was recorded in fiscal 2014. No impairment on goodwill was recorded during fiscal 2015 or fiscal 2016.

Provision for environmental rehabilitation

Our mining and exploration activities are subject to various laws and regulations governing the protection of the environment. Estimated long term environmental obligations, comprising pollution control, rehabilitation and mine closure, are based on the Group's environmental management plans. Annual changes in the provision consist of finance costs relating to the change in the present value of the provision and inflationary increases in the provision estimate, as well as changes in estimates. The present value of environmental disturbances created is capitalized to mining assets against an increase in the rehabilitation provision. The rehabilitation asset is depreciated as discussed above. Rehabilitation projects undertaken, included in the estimates are charged to the provision as incurred. The cost of ongoing current programs to prevent and control pollution is charged against income as incurred.

Deferred Taxes

The taxable income from gold mining at our South African operations was subject to a formula to determine the taxation expense. The tax rate calculated using the formula was capped to a maximum mining statutory rate of 34% for fiscal 2016, fiscal 2015 and fiscal 2014. Taxable income is determined after the deduction of qualifying mining capital expenditure to the extent that it does not result in an assessed loss. Excess capital expenditure is carried forward as unredeemed capital expenditure and is eligible for deduction in future periods, taking the assessed loss criteria into account. Further to this, mines are ring-fenced and are treated separately for tax purposes, with deductions only being available to be claimed against the mining income of the relevant ring-fenced mine.

In terms of IAS 12 — *Income Taxes*, deferred tax assets and liabilities are measured at the tax rates that are expected to apply to the period when the asset is realized or the liability is settled, and at our South African operations, such average tax rates are directly impacted by the profitability of the relevant ring-fenced mine. The deferred tax rate is therefore based on the current estimate of future profitability of an operation when temporary differences will reverse, based on tax rates and tax laws that have been enacted at balance sheet date.

The future profitability of each ring-fenced mine, in turn, is determined by reference to the life-of-mine plan for that operation. The life-of-mine plan is based on parameters such as the Group's long term view of the US$ gold price and the Rand/US$ exchange rate, as well as the reserves declared for the operation. As some of these parameters are based on market indicators, they differ from one year to the next. In addition, the reserves may also increase or decrease based on updated or new geological information.

We do not recognize a deferred tax asset when it is more likely than not that the asset will not be utilized. Assessing recoverability of deferred tax assets requires management to make significant estimates related to expectation of future taxable income. Estimates of future taxable income are based on forecasted cash flows from operations, reversals of deferred tax liabilities and the application of existing tax laws in each jurisdiction. To the extent that future taxable income differs significantly from estimates, our ability to realize the net deferred tax assets recorded at the balance sheet date could be impacted. Additionally, future changes in tax laws in the jurisdictions in which we operate could limit our ability to obtain the future tax benefits represented by deferred tax assets recorded at the balance date.

Revenue

Most of our revenues are derived from the sale of gold. As a result, our operating results are directly related to the price of gold. Historically, the price of gold has fluctuated widely. The gold price is affected by numerous factors over which we do not have control. See Item 3: *"Key Information—Risk Factors—The profitability of our operations, and cash flows generated by those operations, are affected by changes in the price of gold. A fall in the gold price below our cash cost of production for any sustained period may lead to losses and require Harmony to curtail or suspend certain operations".* As a general rule, we sell our gold produced at market prices to obtain the maximum benefit from increases in the prevailing gold price and do not enter into hedging arrangements such as forward sales or derivatives that establish a price in advance for the sale of our future gold production.

Subsequent to June 30, 2016, Harmony entered into short term gold forward sale contracts for a total of 432,000 ounces over a period of 24 months. These contracts manage variability of cash flows for approximately 20% of the Group's total production and were concluded at an average gold price of R682,000/kg. Harmony will apply cash flow hedge accounting to these contracts.

Significant changes in the price of gold over a sustained period of time may lead us to increase or decrease our production in the nearterm.

Harmony's Realized Gold Price

In fiscal 2016, the gold price remained volatile and the average gold price in US dollars received by us was US$1,169 per ounce. The market price for gold (and, accordingly, the price received by us) is affected by numerous factors over which we have no control. See Item 3: *"Key Information—Risk Factors—The profitability of our operations, and cash flows generated by those operations, are affected by changes in the price of gold. A fall in the gold price below our cash cost of production for any sustained period may lead to losses and require Harmony to curtail or suspend certain operations".*

The following table sets out the average, the high and the low London Bullion Market price of gold and our average US dollar sales price during the past three fiscal years:

	Fiscal Year Ended June 30,		
	2016	2015	2014
		($/oz)	
Average	1,169	1,224	1,296
High	1,325	1,340	1,420
Low	1,049	1,142	1,195
Harmony's average sales price(1)	1,169	1,222	1,299

(1) Our average sales price differs from the average gold price due to the timing of our sales of gold within each year.

Costs

Our cash costs typically make up between 70% and 80% of our total costs (excluding impairments). The remainder of our total costs consists primarily of exploration costs, employment termination costs, corporate and sundry expenditure, and depreciation and amortization. Our cash costs consist primarily of production costs exclusive of depreciation and amortization. Production costs are incurred on labor, equipment, consumables and utilities. Labor costs are the largest component and typically comprise between 50% and 55% of our production costs.

Our all-in sustaining costs decreased from US$1,231 in fiscal 2015 to US$1,003 in fiscal 2016. The primary reason for the decrease in US dollar terms is the weakening of the Rand against the US dollar in fiscal 2016. This weakening of the Rand resulted in the Rand amounts being translated at a higher rate of R14.50 compared to R11.45 in fiscal 2015. The weakening of the Rand was offset by the impact of the decrease in ounces sold, increased labor and energy costs, as well as inflationary pressures on supply contracts.

Our cash costs have decreased from US$1,003 per ounce in fiscal 2015 to US$841in fiscal 2016, mainly due to the depreciation of the Rand against the US dollar, which was partially offset by the impact of increased labor and energy costs and inflationary pressures on supply contracts. Management continuously review costs at all operations, to ensure that costs are properly managed and within budget.

Our US translated costs are very sensitive to the exchange rate of the Rand and other non-US currencies to the US dollar. See Item 5:*"Operating and Financial Review and Prospects—Exchange Rates"*. Appreciation of the Rand and other non-US currencies against the US dollar increases working costs at our operations when those costs are translated into US dollars. See Item 3:*"Key Information—Risk Factors—Foreign exchange fluctuations could have a material adverse effect on Harmony's operational results and financial condition"*.

The average exchange rate of the South African Rand depreciated approximately 27% against the US dollar in fiscal 2016 compared to fiscal 2015. In the case of our International operations, the Australian dollar depreciated by 13% against the US dollar in fiscal 2016, while the Kina depreciated by 15% against the US dollar in fiscal 2016.

Management conducts a thorough review of costs at all operations to ensure that costs are properly managed and within budget. However, it should be noted that there are risks beyond our control such as safety stoppages, which would result in production being negatively affected while certain costs would still be incurred. This is discussed in more detail in *"Risk Factors—Given the nature of mining and the type of gold mines we operate, we face a material risk of liability, delays and increased cash costs of production from environmental and industrial accidents and pollution"* and *"—The nature of our mining operations presents safety risks"*.

Reconciliation of Non-GAAP Measures

All-in sustaining costs, all-in sustaining costs per ounce, total cash costs and total cash costs per ounce are non-GAAP measures.

The World Gold Council ("**WGC**") published industry guidance in June 2013 on the calculation of "all-in sustaining costs" and "all in cost" non-GAAP measures, developed to create a better understanding of the overall costs associated with producing gold. Although Harmony is not a member of the WGC, we started disclosing all-in sustaining costs in the 2014 fiscal year (only for continuing operations). The all-in sustaining cost measure is an extension of the existing cash cost measure (refer below) and incorporates costs related to sustaining production.

All-in sustaining costs include mine production costs, transport and refinery costs, applicable general and administrative costs, costs associated with movements in production inventories, ore stockpiles, as well as ongoing environmental rehabilitation costs, transfers for stripping activities and costs associated with royalties. Employee termination costs are included, however employee termination costs associated with major restructuring and shaft closures are excluded. The following costs are also included: local economic development ("**LED**") expenditure for continuing operations, corporate costs, sustaining exploration costs and sustaining capital expenditure including ongoing capital development ("**OCD**") expenditure and rehabilitation accretion and amortization for continuing operations. Gold ounces sold are used as the denominator in the all-in sustaining costs per ounce calculation. The all-in sustaining cost per ounce figures for fiscal 2015 and fiscal 2014 have been restated to exclude the share-based payment charge.

Our cash costs consist primarily of production costs and are expensed as incurred. The cash costs are incurred to access ore to produce current mined reserves. Cash costs do not include capital development costs, which are incurred to allow access to the orebody for future mining operations and are capitalized and amortized when the relevant reserves are mined.

Total cash costs include mine production costs, transport and refinery costs, applicable general and administrative costs, ore stockpiles, as well as ongoing environmental rehabilitation costs as well as transfers for stripping activities and costs associated with royalties. Employee termination cost is included, however employee termination costs associated with major restructuring and shaft closures are excluded. The costs associated with movements in production inventories are excluded from total cash costs. Gold ounces produced are used as the denominator in the total cash costs per ounce calculation.

Changes in all-in sustaining costs per ounce and cash costs per ounce are affected by operational performance, as well as changes in the currency exchange rate between the Rand and the US dollar and, in the case of the Papua New Guinean operations, the Kina. All-in sustaining costs, all-in sustaining costs per ounce, total cash costs and total cash costs per ounce are non-GAAP measures. All-in sustaining costs, all-in sustaining costs per ounce, total cash costs and total cash costs per ounce should not be considered by investors in isolation or as an alternative to production costs, cost of sales, or any other measure of financial performance calculated in accordance with IFRS. In addition, the calculation of all-in sustaining costs, all-in sustaining costs per ounce, total cash costs and total cash costs per ounce may vary from company to company and may not be comparable to other similarly titled measures of other companies. However, we believe that all-in sustaining costs per ounce and cash costs per ounce are useful indicators to investors and management of a mining company's performance as they provide (1) an indication of the cash generating capacities of our mining operations, (2) the trends in all-in sustaining costs and cash costs as the Company's operations mature, (3) a measure of a company's performance, by comparison of cash costs per ounce to the spot price of gold and (4) an internal benchmark of performance to allow for comparison against other companies.

While recognizing the importance of reducing all-in sustaining costs and cash costs, our chief focus is on controlling and, where possible, reducing total costs, including overhead costs. We aim to control total unit costs per ounce produced by maintaining our low total cost structure at our existing operations. We have been able to reduce total costs by implementing a management structure and philosophy that is focused on reducing management and administrative costs.

The following is a reconciliation of total all-in sustaining costs from continuing operations only, as a non-GAAP measure, to the nearest comparable GAAP measure, cost of sales:

	Fiscal year ended June 30,		
	2016	**2015***	**2014***
	(in $ millions, except for ounce amounts)		
Total cost of sales from continuing operations – under IFRS	1,088	1,645	1,549
Depreciation and amortization expense	(145)	(212)	(205)
Rehabilitation credit/(costs)	3	1	(1)
Care and maintenance costs of restructured shafts	(8)	(9)	(6)
Employment termination and restructuring costs	(1)	(22)	(26)
Share-based payments	(23)	(18)	(26)
Impairment of assets	3	(285)	(135)
Other	1	7	—
LED costs	3	6	8
Corporate, administration and other expenditure costs	23	27	33
Exploration (sustaining)	—	—	1
Capital expenditure (OCD)	96	154	151
Capital expenditure (Exploration, abnormal expenditure and shaft capital)	45	65	82
Total all-in sustaining costs	1,085	1,359	1,425
Per ounce calculation:			
Ounces sold	1,081,615	1,103,793	1,166,682
Total all-in sustaining costs per ounce	1,003	1,231	1,222

*** *Restated to exclude share-based payment charge of US$18 million (or US$15 per ounce) and US$26 million (or US$20 per ounce) in fiscal 2015 and fiscal 2014.***

The following is a reconciliation of total cash costs, as a non-GAAP measure, to the nearest comparable GAAP measure, cost of sales under IFRS:

	Fiscal year ended June 30,		
	2016	2015	2014
	(in $ millions, except for ounce amounts)		
Total cost of sales – under IFRS	1,088	1,645	1,549
Depreciation and amortization expense	(149)	(216)	(207)
Rehabilitation (costs)/credit	3	1	(1)
Care and maintenance costs of restructured shafts	(8)	(9)	(6)
Employment termination and restructuring costs	(1)	(22)	(26)
Share-based payments	(23)	(18)	(26)
(Reversal of impairment)/impairment of assets	3	(285)	(135)
Other	1	7	—
Gold inventory movement	(4)	(22)	10
Total cash costs	910	1,081	1,158
Per ounce calculation:			
Ounces produced	1,082,035	1,077,466	1,171,987
Total cash costs per ounce	841	1,003	988

Within this report, our discussion and analysis is focused on the all-in sustaining costs and total cash costs measure.

Exchange Rates

Our revenues are very sensitive to the exchange rate of the Rand and other non-US currencies to the US dollar.

Currently, the majority of our earnings are generated in South Africa and, as a result, most of our costs are incurred in Rand. Since gold is generally sold in US dollars, most of our revenues are received in US dollars. The average gold price received by us during fiscal 2016 decreased by US$53 per ounce to US$1,169 per ounce from US$1,222 per ounce during fiscal 2015. Appreciation of the Rand against the US dollar increases our US dollar working costs at our South African operations when those costs are translated into US dollars, which serves to reduce operating margins and net income from our South African operations. Depreciation of the Rand against the US dollar reduces these costs when they are translated into US dollars, which serves to increase operating margins and net income from our South African operations. Accordingly, strengthening of the Rand generally results in poorer earnings for us if there is not a similar increase in the gold price.

The exchange rates obtained when converting US dollars to Rand are determined by foreign exchange markets, over which we have no control. The conversion rate for balance sheet items as at June 30, 2016 is R14.72 per US$1.00, except for specific items within equity that are converted at the exchange rate prevailing on the date the transaction was entered into. This compares with a conversion rate of R12.16 per US$1.00 as at June 30, 2015, reflecting a depreciation of 21% of the Rand against the US dollar. Income statement items were converted at the average exchange rate for fiscal 2016 of R14.50 per US$1.00, reflecting a depreciation of 27% of the Rand against the US dollar when compared with fiscal 2015.

In fiscal 2016, Harmony entered into foreign exchange hedging contracts in the form of zero cost collars, which establish a minimum (floor) and maximum (cap) Rand/US dollar exchange rate at which to convert US dollars to Rand. At June 30, 2016, the nominal amount of the hedging contracts is US$500 million and is spread over a 12 month period with a weighted average cap price of US$1=R18.27 and weighted average floor price of US$1=R15.55.

The majority of our working costs are incurred in Rand and, as a result of this, depreciation of the Rand against the US dollar decreased our working costs when translated into US dollars. Offsetting this decrease are increases in our labor costs as well as inflationary pressures on our consumables and energy costs, which would decrease operating margins and net income reflected in our consolidated income statement. Appreciation of the Rand against the US dollar would cause an increase in our costs in US dollar terms. Similarly, at our International operations, appreciation of the Australia dollar or Kina against the US dollar would cause an increase in our costs in US dollar terms. See Item 3: *"Key Information—Risk Factors—Foreign exchange fluctuations could have a material adverse effect on Harmony's operational results and financial condition"*.

On June 4, 2014 the Bank of Papua New Guinea introduced an exchange rate trading band requiring all foreign currency traded in the market to be ± 75 basis points (± 0.0075 PGK/US$ points) from the official interbank rate. This had the effect of strengthening the Kina by approximately 10% and the US$ equivalent of Kina denominated costs higher. The Bank of Papua New Guinea has weakened the Kina against the US$ by approximately 40 basis points per month in fiscal 2016. Since the introduction of the trading band the Kina has weakened by 23% against the US$ as at June 30, 2016. Should the trading band continue and depending on the level the exchange rate is set at, it could have a negative impact on the results of the Hidden Valley operation, as well as the cost of development at Golpu and other PNG exploration sites.

Inflation

Our operations have been materially affected by inflation. Inflation in South Africa was 6.3% at the end of fiscal 2016, 4.7% at the end of fiscal 2015 and 6.6% at the end of fiscal 2014. Working costs, especially wages, have increased considerably over the past several years resulting in significant cost pressures for the mining industry. In addition, the effect on inflation of the increase in electricity tariffs of 8% in fiscal 2014, 12.7% in fiscal 2015 and 9.4% in fiscal 2016 together with an estimated increase of approximately 12.7% in fiscal 2017, will have a negative effect on the profitability of our operations.

The inflation rate in PNG ended fiscal 2014 at 6% and 2015 at 6.1%, while the annualized inflation stood at 6.4% at the end of fiscal 2016.

Our profits and financial condition could be adversely affected if the cost inflation is not offset by a concurrent devaluation of the Rand and other non-US currencies and/or an increase in the price of gold. See Item 3: *"Key Information—Risk Factors—Our operations may be negatively impacted by inflation"*.

South African Socio-Economic Environment

We are a South African company and the majority of our operations are in South Africa. As a result, we are subject to various economic, fiscal, monetary and political policies and factors that affect South African companies generally. See Item 3: *"Key Information—Risk Factors—The socio-economic framework in the regions in which Harmony operates may have an adverse effect on its operations and profits"*.

South African companies are subject to exchange control limitations. While exchange controls have been relaxed in recent years, South African companies remain subject to restrictions on their ability to deploy capital outside of the Southern African Common Monetary Area. See Item 10: *"Additional Information—Exchange Controls*".

Social and Labor Plans, or SLPs, have been developed for each of our South African operations. These SLPs are prepared in line with legislation governing the participation of HDSAs in mining assets.

We have been granted all of our mining licenses under the MPRDA. We have therefore already started to incur expenses relating to HDSA participation. We believe the biggest challenge will lie in maintaining these licenses, as we will have a responsibility in respect of human resource development, procurement and local economic development. We are unable, however, to provide a specific amount of what the estimated cost of compliance will be but we will continue to monitor these costs on an ongoing basis.

Electricity in South Africa

In South Africa, almost all of the energy we consume is in the form of electricity purchased from the national power utility, Eskom, which is largely derived from coal-fired power stations. Years of underinvestment in the country's power infrastructure has meant that energy demands are rising faster than Eskom's current supply and the supply to be provided by new projects.

The adequacy of Eskom generation capability depends upon such factors as the installed capacity, unit size, plant reliability, demand forecasting error and the shape of the load curve. The reserve margin is a deterministic criterion, which provides perhaps the simplest available measure of system security.

During fiscal 2016, the electricity supply in South Africa stabilized marginally following the power interruptions (also referred to as load shedding) occurring at short notice in fiscal 2015, similar to the power interruptions and electricity supply shortages experienced in 2008. This is largely due to the demand for electricity dropping as a result of market conditions and due to the success of the Department of Energy's Renewable Energy IPP Procurement Programme ("**REIPPP**") which has seen a number of renewable energy power plants being commissioned in 2016 and alleviating the pressure on the grid. Load shedding may resume in future if market conditions improve and if Eskom is unable to keep up with the demand.

Nationally, the supply and demand for electricity peaks during the evening between 17h00 and 20h00. Harmony participates voluntarily in the Eskom Demand response program to reduce their demand during the said periods. Various load clipping and load shifting projects were implemented by the South African operations to reduce the electricity demand during evening peaks. Load shifting is generally achieved by rescheduling the pumping to pump water mainly outside of the evening peaks. Load clipping is achieved by reducing the compressed air demand during evening peak periods. Harmony also benefits financially from this as the Eskom tariffs are more expensive during that period. The risk of having power outages will be mainly limited to the evening peak periods in the current situation. This could change during summer months as the demand profile does not have the same evening peaks as during winter months, additional maintenance is scheduled for summer months hence reducing the reserve margin. Should there be major unplanned outages of Eskom generation capacity, it will be a country or sector problem and municipalities should be the first to have power outages.

The Department of Energy, through its REIPP Programme, has successfully procured 6,4 GW from various renewable energy sources including solar, wind, hydro and biomass from 102 IPPs over a number rounds of bidding. Of the total renewable energy projects procured to date, projects generating approximately 3,9 GW are at various stages of construction or have commenced with commercial operation.

The Department's Coal Baseload IPP Procurement Programme ("**the Coal Programme**") aims to procure 2 500 MW of electricity from coal-fired power stations, with individual bids capped at 600 MW per project. The first bid window is focused on the domestic market. Similar to the REIPPP Programme, the Coal Programme is structured as a rolling procurement programme. The RFP for the first Coal Programme bid window was released to the market on December 15, 2014, and the announcement of preferred bidders is outstanding.

An allocation of 800 MW was originally determined for the Department's Cogeneration IPP Procurement Programme ("**the Cogeneration Programme**") for the procurement of capacity from industrial cogenerating facilities. Subsequently, an amendment was made to that Determination, adding an additional 1 000 MW of capacity to the Cogeneration Programme. The 'brownfields' Cogeneration Programme was released to the market on June 4, 2015 and two bid windows have been run to date.

The Department is also working on an LNG-to-Power IPP Procurement Programme to kick-start South Africa's fledgling gas economy. The Preliminary Information Memorandum for this new energy programme is expected to be released to the market during 2016.

Finally, the Department is pursuing a nuclear new build programme in line with the South African Nuclear Energy Policy of 2008, the current Integrated Resource Plan, 2010, which provides for the roll-out of 9,600 MW of new nuclear capacity by 2030 and the National Development Plan. In September 2016 it was announced that the Department had procured the services of a number of transaction and expert advisors to assist it in structuring the nuclear procurement programme.

In addition to these Department lead procurement programmes which are seek to diversify South Africa's energy mix, progress has been made on a number of Eskom lead projects including the Medupi, Kusile and Ingula power stations.

Tariffs

Like all mining companies, Harmony is a major user of electricity, mostly supplied by South Africa's power utility, Eskom. Energy is a significant and growing portion of our operating costs, given rising electricity tariffs. After an average increase of 22% in each of fiscal 2010, fiscal 2011 and fiscal 2012, tariffs rose by a further 9.6% in fiscal 2013, 8.0% in fiscal 2014, 12.7% in fiscal 2015 and 9.4% in fiscal 2016. On October 3, 2014, NERSA announced the approval of the implementation plan of the Regulatory Clearing Account ("**RCA**") balance for Eskom. This is a once-off recovery from standard tariff customers and other Eskom customer categories. The implementation of the second Multi-Year Determination RCA in 2015/2016 will result in an average tariff increase of 12.7% from the 8.0% approved in the third Multi-Year Determination decision of February 2013.

Energy efficiency

Harmony has worked closely with Eskom to manage electricity use and peak demand, underlining our commitment to reduce energy consumption. This includes demand-side management ("**DSM**") strategies to reduce electricity consumption in peak periods; timing our pumping to coincide with cheaper off-peak periods, making more efficient use of Eskom tariffs that reward load-shifting, and improving the efficiency of pumping operations.

We have implemented various energy efficiency projects in recent years. See *"Integrated Annual Report for the 20-F 2016—Harmony in Action—Environmental performance—"* on pages 65 to 67.

Renewable energy

Harmony continues to assess various energy-generating initiatives.
See *"Integrated Annual Report for the 20-F 2016Social and ethics committee chairman's report"* on pages 16 to 18 *and "Integrated Annual Report for the 20-F 2016—Harmony in Action—Environmental performance—"* on pages 67 to 68.

Results of Operations

Years Ended June 30, 2016 and 2015

Revenues

Revenue decreased by 6%, from US$1,348 million in fiscal 2015 to US$1,264 million in fiscal 2016. This decrease can be attributed to a 4% decrease in the gold price received of US$1,169 per ounce for fiscal 2016, compared to US$1,222 per ounce for fiscal 2015 and 2% decrease in gold sold. Our gold sales decreased 2%, from 1,103,793 ounces in 2015 to 1,082,615 ounces in 2016. The decrease in ounces can be attributed mainly to planned production stoppages at Kusasalethu to upgrade its infrastructure, lower than expected recovered grade and safety stoppages at Target 1 and safety stoppages and lower grade at Hidden Valley. Target 3 was placed on care and maintenance during fiscal 2015, resulting in a decrease of 15,529 ounces (or 1%) in fiscal 2016 when compared to fiscal 2015.

At Phakisa, ounces sold increased by 26% from 101,468 in fiscal 2015 to 128,314 in fiscal 2016. The recovery grade and tons milled increased by 14% and 12% to 0.170 ounce per ton and 756,000 tons respectively in fiscal 2016 as production continues to ramp up at the operation.

At Tshepong, ounces sold increased by 16% from 139,437 in fiscal 2015 to 161,685 in fiscal 2016. The recovery grade and tons milled increased by 7% and 10% to 0.135 ounce per ton and 1,200,000 tons respectively in fiscal 2016 as the operation continues to focus on operating efficiencies and increasing productivity at the operation.

At Bambanani, ounces sold increased by 2% from 94,748 in fiscal 2016 to 96,934 in fiscal 2015. The recovery grade and tons milled increased by 2% and 1% to 0.378 ounce per ton and 256,000 tons respectively in fiscal 2016 as the operation continues to develop and mine the high grade shaft pillar.

At Hidden Valley, ounces sold decreased by 22% from 96,548 in fiscal 2015 to 75,233 in fiscal 2016. The recovery grade and tons milled decreased by 19% and 5% to 0.038 ounce per ton and 1,906,000 tons respectively in fiscal 2016. Hidden Valley lost approximately 33 production days during the September 2015 quarter when operations were suspended due to a fatality in July 2015. The operation was also affected by safety related road closures, which restricted mining activity. Stripping activities for Stage 5 remained suspended in fiscal 2016, resulting in the increase in the processing or ore stockpiles towards the end of the financial year.

At Target 1, ounces sold decreased by 12% from 124,358 in fiscal 2015 to 109,923 in fiscal 2016. The recovery grade and tons milled decreased by 10% and 1% to 0.134 ounce per ton and 814,000 tons respectively in fiscal 2016. Target 1 was adversely affected by safety stoppages during the March 2016 quarter and lower than expected recovered grade during fiscal 2016.

At Kusasalethu, ounces sold decreased by 11% from 138,151 in fiscal 2015 to 122,880 in fiscal 2016. The recovery grade increased by 33% to 0.169 ounce per ton as the focus was on mining higher grade areas in fiscal 2016. Tons milled decreased by 26% to 736,000 tons in fiscal 2016. The decrease in ounces sold and tons milled can be attributed mainly to planned production stoppages at Kusasalethu to upgrade its infrastructure fiscal 2016.

Cost of sales

Cost of sales includes production costs, depreciation and amortization, (reversal of impairment)/impairment of assets and employment termination and restructuring costs.

a) Production costs (cash costs/all-in sustaining costs)

The following table sets out our total ounces produced and weighted average cash costs per ounce and total ounces sold and weighted average all-in sustaining costs per ounce for fiscal 2015 and fiscal 2016:

	Year Ended June 30, 2016				Year Ended June 30, 2015				Percentage (increase)/decrease	
	Cash costs		All-in sustaining costs		Cash costs		All-in sustaining* costs		Cash costs per ounce	All-in sustaining costs per ounce
	(oz produced)	($/oz)	(oz sold)	($/oz)	(oz produced)	($/oz)	(oz sold)	($/oz)		
South Africa										
Kusasalethu	124,198	1,026	122,880	1,254	127,092	1,283	138,151	1,596	20	21
Doornkop	87,772	831	87,193	1,016	85,618	1,092	87,160	1,362	24	25
Phakisa	128,217	741	128,314	936	100,246	1,016	101,468	1,347	27	31
Tshepong	161,751	787	161,685	940	137,540	1,008	139,437	1,235	22	24
Masimong	78,190	916	78,191	1 059	79,187	1,080	80,087	1,302	15	19
Target 1	108,895	787	109,923	1 012	122,944	837	124,358	1,075	6	6
Bambanani	96,870	576	96,934	654	93,495	651	94,748	735	12	11
Joel	73,239	796	72,179	911	72,596	908	74,911	1,043	12	13
Unisel	54,785	949	54,817	1 064	54,495	1,080	55,138	1,275	12	17
Target 3(1)	—	—	—	—	15,529	958	16,140	1,096	n/a	n/a
Other – surface	95,553	935	94,266	994	94,105	1,000	95,647	1,070	7	7
International										
Hidden Valley(2)	72,565	1,028	75,233	1,282	94,619	1,065	96,548	1,395	3	8
Total	1,082,035		1,081,615		1,077,466		1,103,793			
Weighted average		841		1,003		1,003		1,231	16	19

(1) The Target 3 operation was suspended and the mine placed on care and maintenance during the December 2014 quarter.

(2) Cash costs and all-in sustaining costs would have been US$1,320 per ounce and US$1,564 per ounce (2015: US$1,230 per ounce and US$1,557 per ounce) respectively had silver byproduct credits of US$21 million (2015: US$16 million) or US$292 per ounce produced, US$282 per ounce sold (2015: US$169 per ounce produced, US$166 per ounce sold) not been taken into account.

* Restated to exclude the share-based payment charge.

For further information about the use of Non-GAAP measures, refer to Item 5: *"Operating and Financial Review and Prospects—Costs—Reconciliation of Non-GAAP Measures"*.

Our total average all-in sustaining costs per ounce decreased from US$1,231 per ounce in fiscal 2015 to US$1,003 per ounce in fiscal 2016, mainly due to the weakening of the Rand against the US dollar in fiscal 2016.

Our average cash costs decreased by 16%, or US$162 per ounce, from US$1,003 per ounce in fiscal 2015 to US$841 per ounce in fiscal 2016. Cash costs per ounce vary with the working costs per ton (which are, in turn, affected by the number of tons processed) and grade of ore processed. Cash costs expressed in US dollars per ounce also vary with fluctuations in the Rand-US dollar exchange rate, because most of our working costs are incurred in Rand. Offsetting the depreciation of the Rand against the dollar in fiscal 2016 is the decrease in ounces produced and sold by 0.4% and 2% respectively (decrease in the denominator in the per ounce calculation). Operating costs in Rand terms increased by 7%. The South African Rand depreciated by 27% against the US dollar when compared to fiscal 2015. Operating costs in Rand terms were affected mainly by an increase in costs on Phakisa, Tshepong, Bambanani and Joel where costs increased in Rand terms by 18%, 16%, 16% and 12%, respectively, year on year. Annual increases in labor costs as well as inflationary pressures on our consumables and increase in electricity tariffs also contributed towards higher operating costs in fiscal 2016.

At Phakisa, the cash cost per ounce decreased by 27% from US$1,016 per ounce in fiscal 2015 to US$741 per ounce in fiscal 2016. The all-in sustaining cost per ounce decreased by 31% from US$1,347 per ounce in fiscal 2015 to US$936 per ounce in fiscal 2016. The decrease was mainly due to the 28% and 26% increase in gold produced and ounces sold respectively as a result of the increase in the recovered grade (14% increase to 0.170oz/t) and tons milled (12 % increase to 756,000 tons) in fiscal 2016 due to the ramp up in production.

At Doornkop, the cash cost per ounce decreased by 24% from US$1,092 per ounce in fiscal 2015 to US$831 per ounce in fiscal 2016. The all-in sustaining cost per ounce decreased by 25% from US$1,362 per ounce in fiscal 2015 to US$1,016 per ounce in fiscal 2016. The decrease was due to the depreciation of the Rand against the US Dollar and 3% increase in gold produced mainly as a result of the increase in tons milled (5% increase to 695,000 tons) in fiscal 2016.

At Tshepong, the cash cost per ounce decreased by 22% from US$1,008 per ounce in fiscal 2015 to US$787 per ounce in fiscal 2016. The all-in sustaining cost per ounce decreased by 24% from US$1,235 per ounce in fiscal 2015 to US$940 per ounce in fiscal 2016. The decrease was mainly due to the 18% and 16% increase in gold produced and ounces sold respectively as a result of the increase in the recovered grade (increase of 7% to 0.135oz/t) and tons milled (increase of 10% to 1,200,000 tons) in fiscal 2016.

At Kusasalethu, the cash cost per ounce decreased by 20% from US$1,283 per ounce in fiscal 2015 to US$1,026 per ounce in fiscal 2016. The all-in sustaining cost per ounce decreased by 21% from US$1,596 per ounce in fiscal 2015 to US$1,254 per ounce in fiscal 2016. The decrease was mainly due to the depreciation of the Rand against the US Dollar. Gold produced only decreased by 2% to 124,198 ounces due to the 33% increase in recovered grade to 0.169oz/t partially offsetting the 26% decrease in tons milled due to planned production stoppages in fiscal 2016.

At Masimong, the cash cost per ounce decreased by 15% from US$1,080 per ounce in fiscal 2015 to US$916 per ounce in fiscal 2016. The all-in sustaining cost per ounce decreased by 19% from US$1,302 per ounce in fiscal 2015 to US$1,059 per ounce in fiscal 2016. The decrease was mainly due to the depreciation of the Rand against the US Dollar and 3% increase in gold produced mainly as a result of the increase in tons milled in fiscal 2016. Gold produced decreased by 1% to 78,190 ounces due to the 3% decrease in tons milled, offset partially by the increase in the recovered grade. The operation was restructured in fiscal 2015 to focus on the mining of higher grade areas. The recovered grade increased by 2% to 0.109oz/t in fiscal 2016.

At Bambanani, the cash cost per ounce decreased by 12% from US$651 per ounce in fiscal 2015 to US$576 per ounce in fiscal 2016. The all-in sustaining cost per ounce decreased by 11% from US$735 per ounce in fiscal 2015 to US$654 per ounce in fiscal 2016. The decrease was due to the depreciation of the Rand against the US Dollar and 4% and 2% increase in gold produced and ounces sold respectively as a result of the increase in the recovered grade (increase of 2% to 0.378oz/t) and tons milled (increase of 1% to 256,000 tons) in fiscal 2016.

At Hidden Valley, the cash cost per ounce decreased by 3% from US$1,065 per ounce in fiscal 2015 to US$1,028 per ounce in fiscal 2016. Silver by-product credits increased by 31% to US$21 million in fiscal 2016 due to the increase in silver ounces produced (49% to 1,331,328 ounces) and increase in the average silver price. The recovered grade decreased by 19% to 0.038oz/t and tons milled decreased by 5% to 1,906,000 tons in fiscal 2016.

b) Depreciation and amortization

Depreciation and amortization decreased from US$216 million in fiscal 2015 to US$149 million, or 31%, in fiscal 2016 despite the 2% increase in tons milled from 19,919,000 tons in fiscal 2015 to 20,255,000 tons in fiscal 2016. In Rand terms, there was a decrease in depreciation and amortization expense of 12%. The decrease in the depreciation and amortization charge in fiscal 2016 is mainly due to the revised useful lives and residual values mainly related to the scrapping losses recorded for Kusasalethu and Masimong and impairments recorded on Doornkop and Hidden Valley in fiscal 2015. The estimated quantities of economically recoverable proved and probable reserves reduced year on year from fiscal 2015 to fiscal 2016 following the annual life-of-mine reassessment conducted in fiscal 2015.

c) Employment termination and restructuring costs

The charge for employment termination and restructuring costs decreased from US$22 million in fiscal 2015 to US$1 million in fiscal 2016. The charge for fiscal 2016, mainly relates to the restructuring at Doornkop which was initiated towards the end of fiscal 2015. For fiscal 2015, the costs relate to the restructuring at Kusasalethu, Masimong and Hidden Valley. Target 3 was placed on care and maintenance and voluntary severance packages were offered to management in September 2014.

d) (Reversal of impairment)/impairment of assets

A net reversal of impairment of US$3 million was recorded in fiscal 2016 compared to the impairment charge of US$285 million in fiscal 2015. A reversal of impairment of US$50 million was recognized for Doornkop due to the increased Rand gold price assumption, improvements in operational efficiencies following the restructuring in 2015 and new mining areas included in the life-of-mine plan based on additional exploration performed during the 2016 fiscal year. An impairment of US$32 million was recognized for Hidden Valley following a change in the life-of-mine plan during the annual planning process. The updated life-of-mine plan at June 30, 2016 for Hidden Valley results in lower production for the 2017 financial year as the mine will predominantly process ore stockpiles followed by a period of care and maintenance. Stripping activities for stage 5 are planned to recommence in the 2018 financial year according to the life-of-mine plan at the end of fiscal 2016. See "*Item 4 – Recent developments".* An impairment of US$16 million was recognized for Masimong which is a low margin operation and has a remaining life of mine of three years. The exploration programme to locate additional areas of the higher grade B Reef proved unsuccessful and was stopped during the 2016 financial year. In addition, the grade estimation of the Basal Reef decreased. The charge in fiscal 2015 relates primarily to Hidden Valley and Doornkop, where charges of US$174 million and US$85 million respectively were recognized.

Exploration expenditure

Exploration expenditure recorded in fiscal 2016 mainly relates to the Kili Teke gold-copper exploration project in PNG. In fiscal 2016, exploration expenditure decreased from US$23 million to US$13 million. This was as a result of capitalizing the project exploration and evaluation expenditure for the Golpu project, in the 2015 fiscal year following the board approval of the Golpu prefeasibility study. The approval and progression to the final feasibility study stage, together with the reserves previously declared demonstrates the technical and commercial viability of the Golpu project.

Loss on scrapping of property, plant and equipment

A loss on scrapping of US$4 million (2015: US$42 million) was recorded in fiscal 2016.

During fiscal 2016, the abandonment of unprofitable areas in the plans resulted in the derecognition of property, plant and equipment as no future economic benefits are expected from their use or disposal. A loss on scrapping of property, plant and equipment was recognized for Unisel amounting to US$1 million, Joel amounting to US$2 million and mining assets amounting to US$1 million were abandoned for Free State Surface. In fiscal 2015, a loss on scrapping of property, plant and equipment was recognized mainly on Kusasalethu (US$19 million) and Masimong (US$19 million) following the life-of-mine optimization process conducted in fiscal 2015 which led to the abandonment of certain mining levels and areas.

Foreign exchange translation loss (net)

Foreign exchange translation loss (net) decreased from US$32 million in fiscal 2015 to US$13 million in fiscal 2016. The decrease in fiscal 2016 is primarily due to the unrealized and realized derivative gain of US$26 million and US$5 million respectively. During fiscal 2016, Harmony entered into foreign exchange hedging contracts (forex hedging contracts) in the form of zero cost collars, which establish a minimum (floor) and maximum (cap) Rand/US dollar exchange rate at which to convert US dollars to Rand. The nominal value of open forex hedging contracts at June 30, 2016 was US$500 million. The hedging contracts are spread over a 12 month period. The mark-to-market of the derivative asset was US$25 million positive as at June 30, 2016. This was due to the strengthening of the Rand exchange rate against the US dollar since entering into the forex hedging contracts. Hedge accounting is not applied to these forex hedging contracts and all gains have been recorded in the income statement. The foreign exchange translation loss relating to the translation of the US$ revolving credit facilities into Rand increased from US$33 million in fiscal 2015 to US$46 million in fiscal 2016. The Rand weakened by 21% from a closing rate of R12.16 in fiscal 2015 to R14.72 in fiscal 2016.

Income and mining taxes

In fiscal 2015 and 2016, the tax rates for companies were 34% for mining income and 28% for non-mining income for South African companies and 30% for Australian companies and PNG mining companies.

Income and mining tax	**2016**	**2015**
Effective income and mining tax rate	40%	(14)%

The effective tax rate for fiscal 2016 was higher than the mining statutory tax rate of 34% for us and our subsidiaries as a whole due to increased profitability of most of the South African operations in fiscal 2016 as a result of the increase in the average Rand gold price received and the increase in the average deferred tax rates at the South African operations due to higher estimated profitability following the completion of the updated life-of-mine plans. The most significant items causing the group's income tax provision to differ from the mining statutory tax rate are:

- No tax consequences relating to the impairment recorded on Hidden Valley and deferred tax assets not recognized which relates primarily to the Hidden Valley operation.
- Rate differences related to the additional capital allowances that may be deducted from mining taxable income in South Africa, which mainly relates to Avgold Limited (which includes the Target 1 operation).

Deferred tax rates for the South African operations are calculated based on estimates of the future profitability of each ring-fenced mine when temporary differences will reverse. The future profitability of each ring-fenced mine, in turn, is determined by reference to the life-of-mine plan for that operation, which is based on parameters such as the Group's long term view of the US$ gold price and the Rand/US$ exchange rate, as well as the reserves declared for the operation. As some of these parameters are based on market indicators, they differ from one year to the next. In addition, the reserves may also increase or decrease based on updated or new geological information. Changes in the future profitability of each ring-fenced mine impact the deferred tax rates used to recognize temporary differences at these operations. See *"— Critical Accounting Policies and Estimates—Deferred taxes*" above. The increase in deferred tax on temporary differences due to changes in estimated effective tax rates results primarily from an increase in the effective deferred tax rate at Freegold (includes the Bambanani, Joel, Phakisa and Tshepong operations) and Harmony (includes the Masimong, Unisel and Free State Surface operations). The deferred tax rate at Freegold increased from 16.7% in fiscal 2015 to 20.0% in fiscal 2016 and Harmony increased from 12.5% in fiscal 2015 to 21.1%, both increases mainly due to higher estimated profitability. The deferred tax rate at Randfontein Estates (includes the Doornkop and Kusasalethu operations) decreased from 14.3% to 10.1%, mainly due to the lower estimated profitability of the Kusasalethu operation driven by the decrease in the life-of-mine of the operation.

South Africa. Generally, South Africa imposes tax on worldwide income (including capital gains) of all our South African incorporated tax resident entities at a rate of 28% on non-mining income. We pay taxes separately on mining income and non-mining income. The amount of our South African mining income tax is calculated on the basis of a gold mining formula that takes into account our total revenue and profits from, and capital expenditure for, mining operations in South Africa. 5% of total mining revenue is exempt from taxation in South Africa as a result of the application of the gold mining formula. The amount of revenue subject to taxation is calculated by deducting qualifying capital expenditures from taxable mining income. The amount by which taxable mining income exceeds 5% of mining revenue constitutes taxable mining income. We and our subsidiaries account for taxes separately that is determined in respect of each entity. Hence South Africa does not make use of any group basis of taxation.

South Africa has a Controlled Foreign Company regime which effectively attributes certain types of passive income derived by offshore subsidiaries and imputes that income in taxable income as if it had been derived in South Africa under South African tax rules.

The Davis Tax Committee released its first interim mining tax report to the Minister of Finance on 13 August 2015. The Davis Tax Committee has been established to review the current South African mining tax regime for consideration by the Government. This does not currently affect any non-resident shareholders or non-resident ADSs holders, although it may have an indirect effect in future on the mining tax regime in South Africa.

The main recommendations by the Davis Tax Committee were the following:

- the discontinuing of the 100% upfront capital expenditure write off applicable to mining companies;
- the retaining of the "gold formula" for existing gold mines only, as new gold mines would be unlikely to be established An alternative recommendation was to phase out the gold formula for all mines over a reasonable period of time"; and
- phasing out of the additional capital allowances available to certain gold mines.

The above main proposals will bring the gold mining corporate income tax regime in line with the tax system applicable to other corporate taxpayers in South Africa.

Australia. Generally, Australia also imposes tax on the worldwide income (including capital gains) of all of our Australian incorporated and tax resident entities. The current income tax rate for companies is 30%.

Harmony Gold (Australia) Proprietary Limited and its wholly-owned Australian subsidiary companies are recognized and taxed as a single entity. Under the consolidation rules all of the Australian subsidiary companies are treated as divisions of the Head Company, Harmony Gold Australia. As a result, inter-company transactions between group members are generally ignored for tax purposes. This allows the group to transfer assets between group members without any tax consequences, and deems all tax losses to have been incurred by the Head Company of the group.

Withholding tax is payable on dividends, interest and royalties paid by Australian residents to non-residents, which would include any dividends on the shares of our Australian subsidiaries that are paid to us. In the case of dividend payments to non-residents, a 30% withholding tax applies. However, where the recipient of the dividend is a resident of a country with which Australia has concluded a double taxation agreement, the rate of withholding tax is generally limited to 15% (or in the case of South Africa 5% where the dividend is paid to a company which controls at least 10% of the Australian dividend paying company). Where dividends are fully franked, no withholding tax applies as an effective credit is allowed against any withholding tax otherwise payable, regardless of whether a double taxation agreement is in place. However, due to the tax profile of Harmony Gold Australia it is not expected to have any franking credits in the foreseeable future.

Where conduit foreign income received by an Australian company is paid from Australia as a dividend, it is not subject to dividend withholding tax.

Australia has a Controlled Foreign Company regime which effectively attributes certain types of passive income derived by offshore subsidiaries and taxes that income as if it had been derived in Australia under Australian tax rules.

PNG. The Hidden Valley mine in PNG commenced operations in fiscal 2010. We are also reviewing other potential projects and carrying out extensive exploration.

PNG mining projects are taxed on a project basis. Therefore each project is taxed as a separate entity, even though it may be one of a number of projects carried on by the same company. In certain circumstances there is an ability to transfer the tax benefit obtained through exploration expenditure between projects and wholly-owned companies. Tax losses are generally quarantined or ring-fenced and cannot be transferred between projects.

PNG mining companies are taxed at a rate of tax of 30%. Mining operations in PNG are subject to a 2% royalty which is payable to the PNG Government.

Capital development and exploration expenditure incurred in PNG is capitalized for tax purposes and can be generally deducted at 25% per annum on a diminishing value basis against project income, with the deduction being limited to the lesser of 25% of the diminished value or the income of the project for the year.

PNG imposes dividend withholding tax of 10% on dividends paid by PNG mining operations to non-residents. Although PNG also imposes interest withholding tax on interest paid off-shore, the PNG Tax Act exempts interest paid to non-resident lenders from withholding tax where the PNG company is engaged in mining operations in PNG. These rates only apply once an entity has commenced mining and do not apply to entities at the exploration stage.

The PNG Government set up a Taxation Review Committee in 2013. The Committee released a total of 10 Issues Papers between March 2014 and October 2015. The Committee requested submissions on each of the papers and to the extent it was relevant Harmony made submissions. The Mining companies in general supported maintaining the status quo in relation to State Equity versus additional taxes.

In October 2015 the Committee released its Report to the PNG Government with a recommendation to introduce an Additional Profits Tax at 35% for Mining in the 2017 Budget which is generally announced in November 2016. At the time the hurdle rate for the Additional Profits Tax was recognized as requiring further discussion with industry and to date has not been set.

The Tax Review Committee recommendation is for the Additional Profits Tax to be accompanied by a reduction in Corporate income tax rate from 30% to 25% and to reduce the State Equity Participation rate from 30% to 5%. However, this is in contrast to the draft Mining Act which calls for State Equity to be raised to 50% and royalties from 2% to 3%.

The recommendations of the Taxation Review Committee have not yet been finalized.

Years Ended June 30, 2015 and 2014

Revenues

Revenue decreased by 11%, from US$1,515 million in fiscal 2014 to US$1,348 million in fiscal 2015. This decrease can be attributed to a 6% decrease in the gold price received of US$1,222 per ounce for fiscal 2015, compared to US$1,299 per ounce for fiscal 2014 and a decrease in gold sold. Our gold sales decreased by 5%, from 1,166,682 ounces in 2014 to 1,103,793 ounces in 2015. The decrease in ounces can be attributed mainly to numerous production stoppages at Kusasalethu, lower-than-expected recovered grade at Target 1 and a breakdown in the overland conveyor belt and planned maintenance at the metallurgical plant impacted production at Hidden Valley. Target 3 was placed on care and maintenance during fiscal 2015.

At Bambanani (excluding Steyn 2, which was placed on care and maintenance during March 2014), ounces sold increased by 15% from 82,530 in fiscal 2014 to 94,748 in fiscal 2015. The recovery grade and tons milled increased by 2% and 11% to 0.370 ounce per ton and 253,000 tons respectively in fiscal 2015 following the development and mining of the high grade shaft pillar.

At Phakisa, ounces sold increased by 7% from 95,263 in fiscal 2014 to 101,468 ounces in fiscal 2015. This was mainly a result of a 6% increase in tons milled from 636,000 tons in fiscal 2014 to 674,000 tons in fiscal 2015 as the operation continues to build up production.

At Tshepong, ounces sold increased by 3% from 135,161in fiscal 2014 to 139,437 ounces in fiscal 2015. This was mainly a result of a 5% increase in tons milled from 1,044,000 tons in fiscal 2014 to 1,095,000 tons in fiscal 2015.

At Target 3, ounces sold decreased by 64% from 45,301 in fiscal 2014 to 16,140 in fiscal 2015. Target 3 was placed on care and maintenance during the December 2014 quarter following a sustained period of cash flow losses and significant capital expenditure required to sustain the operation.

At Target 1, ounces sold decreased by 14% from 144,936 ounces in fiscal 2014 to 124,358 ounces in fiscal 2015. This can mainly be attributed to the 12.3% decrease in the recovery grade from 0.170 ounce per ton in fiscal 2014 to 0.149 ounces per ton in fiscal 2015. The grade in fiscal 2015 normalized following the higher recovered grade in fiscal 2014 and is in line with the life-of-mine recovery grade.

At Hidden Valley, ounces sold decreased by 9% from 106,322 ounces in fiscal 2014 to 96,548 in fiscal 2015. This is mainly due to the 9% decrease in volumes milled from 2,207,000 tons in fiscal 2014 to 2,012,000 tons in fiscal 2015. Hidden Valley's operations were adversely impacted by breakdowns in the overland conveyor, a safety stoppage due to the fatality in December 2014 and scheduled maintenance at the metallurgical plant. Hidden Valley's poor operational performance and the impact of low commodity prices and high input costs resulted in the restructuring of the operation.

At Masimong, ounces sold decreased by 8% from 87,064 in fiscal 2014 to 80,087 in fiscal 2015. This was mainly a result of the decrease in the recovered grade by 9% from 0.118 ounces per ton in fiscal 2014 to 0.107 ounces per ton in fiscal 2015. To address the poor performance of the operation, Masimong was restructured in fiscal 2015 to improve profitability. Orebody development at Masimong has been significantly reduced and greater focus has been placed on mining higher grade areas.

At Kusasalethu, ounces sold decreased by 5%, from 145,673 in fiscal 2014 to 138,151 in fiscal 2015. This was mainly due to safety stoppages, underground fires and illegal mining activities during fiscal 2015. During the first half of fiscal 2015, the life-of-mine of the operation was optimized by ensuring greater focus on profitable and higher grade areas. The optimization resulted in the abandonment of the unprofitable and lower grade areas of the mine. Levels 78 to 95, four of the existing 11 levels at Kusasalethu were abandoned. Volumes decreased by 21% to 1,001,000 tons, ounces produced decreased by 16% to 127,092 ounces, however, recovered grade increased by 6% to 0.127 ounce per ton in fiscal 2015.

Cost of sales

Cost of sales includes production costs, depreciation and amortization, impairment of assets and employment termination and restructuring costs.

a) Production costs (cash costs/all-in sustaining costs)

The following table sets out our total ounces produced and weighted average cash costs per ounce and total ounces sold and weighted average all-in sustaining costs per ounce for fiscal 2014 and fiscal 2015:

	Year Ended June 30, 2015				**Year Ended June 30, 2014**				**Percentage (increase)/decrease**	
	Cash costs		**All-in sustaining costs***		**Cash costs**		**All-in sustaining costs***			
	(oz produced)	**($/oz)**	**(oz sold)**	**($/oz)**	**(oz produced)**	**($/oz)**	**(oz sold)**	**($/oz)**	**Cash costs per ounce**	**All-in sustaining costs per ounce**
South Africa										
Kusasalethu	127,092	1,283	138,151	1,596	150,916	1,171	145,673	1,544	(10)	(3)
Doornkop	85,618	1,092	87,160	1,362	83,687	1,264	84,653	1,543	14	12
Phakisa	100,246	1,016	101,468	1,347	95,680	1,079	95,263	1,438	6	6
Tshepong	137,540	1,008	139,437	1,235	135,772	981	135,161	1,223	(3)	(1)
Masimong	79,187	1,080	80,087	1,302	87,385	1,082	87,064	1,326	-	2
Target 1	122,944	837	124,358	1,075	144,453	702	144,936	921	(19)	(17)
Bambanani[(3)]	93,495	649	94,748	735	95,424	686	95,165	889	5	17
Joel	72,596	908	74,911	1,043	75,072	885	74,204	994	(3)	(5)
Unisel	54,495	1,080	55,138	1,275	59,093	981	58,964	1,168	(10)	(9)
Target 3[(1)]	15,529	958	16,140	1,096	45,429	1,185	45,301	1,497	19	27
Other – surface	94,105	1,000	95,647	1,070	93,236	1,018	93,976	1,089	2	2
International										
Hidden Valley[(2)]	94,619	1,065	96,548	1,395	105,840	991	106,322	1,244	(7)	(12)
Total continuing operations	1,077,466		1,103,793		1,171,987		1,166,682			
Weighted average		1,003		1,231		988		1,222	2	(1)

(1) The Target 3 operation was suspended and the mine placed on care and maintenance during the December 2014 quarter.

(2) Cash costs and all-in sustaining costs would have been US$1,230 per ounce and US$1,557 per ounce (2014: US$1,184 per ounce and US$1,438 per ounce) respectively had silver byproduct credits of US$16 million (2014: US$20 million) or US$169 per ounce produced, US$166 per ounce sold (2014: US$192 per ounce produced, US$191 per ounce sold) not been taken into account.

(3) Fiscal 2014 includes Steyn 2 which was placed on care and maintenance during March 2014.

* Restated to exclude the share-based payment charge.

Our total average all-in sustaining costs per ounce increased marginally from US$1,242 per ounce in fiscal 2014 to US$1,231 per ounce in fiscal 2015.

Our average cash costs increased by 2%, or US$15 per ounce, from US$988 per ounce in fiscal 2014 to US$1,003 per ounce in fiscal 2015. Cash costs per ounce vary with the working costs per ton (which are, in turn, affected by the number of tons processed) and grade of ore processed. Cash costs expressed in US dollars per ounce also vary with fluctuations in the Rand-US dollar exchange rate, because most of our working costs are incurred in Rand. Offsetting the depreciation of the Rand against the dollar in fiscal 2015 is the decrease in ounces produced and sold by 8% and 5% respectively (increase in the denominator in the per ounce calculation). Operating costs in Rand terms increased by 6%. The South African Rand depreciated by 11% against the US dollar when compared to fiscal 2014. Operating costs in Rand terms were affected mainly by an increase in costs on Kusasalethu, Tshepong, Target 1 and Hidden Valley where costs increased by 14%, 18%, 13% and 4%, respectively, year on year. Annual increases in labor costs as well as inflationary pressures on our consumables and increase in electricity tariffs also contributed towards higher operating costs in fiscal 2015.

At Doornkop, the cash cost per ounce decreased by 14% from US$1,264 per ounce in fiscal 2014 to US$1,092 per ounce in fiscal 2015. The all-in sustaining cost per ounce decreased by 12% from US$1,543 per ounce in fiscal 2014 to US$1,362 per ounce in fiscal 2015. The decrease was mainly due to the increase in gold produced and ounces sold at Doornkop as production in fiscal 2014 was severely impacted by the safety stoppages in fiscal 2014 due to the underground fire in February 2014.

At Phakisa, the cash cost per ounce decreased by 6% from US$1,079 per ounce in fiscal 2014 to US$1,016 per ounce in fiscal 2015. The all-in sustaining cost per ounce decreased by 6% from US$1,438 per ounce in fiscal 2014 to US$1,347 per ounce in fiscal 2015. This was primarily due to an increase in ounces produced and sold as production continues to ramp up.

At Bambanani, the cash cost per ounce decreased by 5% from US$686 per ounce in fiscal 2014 to US$649 per ounce in fiscal 2015. The all-in sustaining cost per ounce decreased by 17% from US$889 per ounce in fiscal 2014 to US$735 per ounce in fiscal 2015. This was due to an increase in ounces produced and ounces sold as result of higher recovered grades at Bambanani as the production from mining the high grade pillar continues to ramp up.

At Target 1, the cash cost per ounce increased by 19% from US$702 per ounce in fiscal 2014 to US$837 per ounce in fiscal 2015. The all-in sustaining cost per ounce increased by 17% from US$921 per ounce in fiscal 2014 to US$1,075 per ounce in fiscal 2015. The increase in the cash cost per ounce and all-in sustaining cost per ounce was mainly due to the decrease in gold produced and gold sold as the recovered grade reduced by 12% to 0.149 ounce per ton in fiscal 2015.

At Kusasalethu, the cash cost per ounce increased by 10% from US$1,171 per ounce in fiscal 2014 to US$1,283 per ounce in fiscal 2015. The all-in sustaining cost per ounce increased by 3% from US$1,544 per ounce in fiscal 2014 to US$1,596 per ounce in fiscal 2015. This was mainly due to the decrease in gold produced and gold sold as the operation was severely impacted by several stoppages during fiscal 2015.

At Unisel, the cash cost per ounce increased by 10% from US$981 per ounce in fiscal 2014 to US$1,080 per ounce in fiscal 2015. The all-in sustaining cost per ounce increased by 9% from US$1,168 per ounce in fiscal 2014 to US$1,275 per ounce in fiscal 2015. The increase was mainly due to the decrease in gold produced and gold sold. Operations were impacted by a fatality in April 2015.

At Hidden Valley, the cash costs per ounce increased by 7%, from US$991 per ounce in fiscal 2014 to US$1,065 per ounce in fiscal 2015. The all-in sustaining cost per ounce increased by 12%, from US$1,244 per ounce in fiscal 2014 to US$1,395 per ounce in fiscal 2015. The increase was primarily due to the decrease in gold production owing to operational and safety stoppages during fiscal 2015.

b) Depreciation and amortization

Depreciation and amortization increased from US$207 million in fiscal 2014 to US$216 million, or 4%, in fiscal 2015 despite the 4% decrease in tons milled from 20,713,000 tons in fiscal 2014 to 19,919,000 tons in fiscal 2015. In Rand terms, there was an increase in depreciation and amortization expense of 15%. The increase in the depreciation and amortization in fiscal 2015 is mainly due to the revised useful lives and residual values of most of Harmony's operations. The estimated quantities of economically recoverable proved and probable reserves reduced year-on-year from fiscal 2014 to fiscal 2015 following the annual life-of-mine reassessment conducted in fiscal 2014.`

c) Employment termination and restructuring costs

The charge for employment termination and restructuring costs decreased from US$26 million in fiscal 2014 to US$22 million in fiscal 2015. Costs in fiscal 2015 relate to the restructuring at Kusasalethu, Masimong and Hidden Valley. Target 3 was placed on care and maintenance and voluntary severance packages were offered to management in September 2014. For fiscal 2014, the costs relate to the completion of the restructuring programmes embarked on by the group's South African operations and at Hidden Valley, both having started during fiscal 2013.

d) Impairment of assets

The impairment charge amounted to US$285 million in fiscal 2015 compared to an impairment charge of US$135 million in fiscal 2014. The charge in fiscal 2015 relates primarily to Hidden Valley, where a charge of US$174 million was recognized following a change in the life-of-mine plan during the annual planning process. Low US$ commodity prices and high operating costs resulted in the shortening of the life-of-mine of the operation. Stripping activities in the new plan have been significantly reduced, resulting in a decrease in the reserves to be mined and the lower recoverable amount at June 30, 2015. An impairment of US$85 million was recognized for Doornkop following the decision to restructure Doornkop and the completion of the revised life-of-mine for the operation. The revised life-of-mine plan includes lower production levels and focuses on higher grade areas. The new plan resulted in a lower recoverable amount. In addition, an impairment of US$23 million for Phakisa following the annual life-of-mine reassessment and US$4 million for Freddies 9 was recognized as plans to develop the project further at this stage have been stopped. The charge in fiscal 2014 relates primarily to Phakisa, where a charge of US$130 million was recognized.

Exploration expenditure

In fiscal 2015, exploration expenditure decreased from US$44 million to US$23 million, primarily as a result of capitalizing the project exploration and evaluation expenditure for the Golpu project following the board approval of the Golpu prefeasibility study in December 2014. The approval and progression to the final feasibility study stage, together with the reserves previously declared demonstrates the technical and commercial viability of the Golpu project.

Loss on scrapping of assets

During fiscal 2015, Harmony management embarked on a life-of-mine optimization process in respect of the South African operations. The optimization ensured greater focus on mining profitable and higher grade areas at our operations and therefore resulted in the abandonment of lower grade and unprofitable areas from the life-of-mine plan for certain of the operations.

A loss on scrapping of US$42 million (2014: US$nil) was recorded. The abandonment of unprofitable areas in the plans resulted in the derecognition of property, plant and equipment as no future economic benefits are expected from their use or disposal and a loss on scrapping of property, plant and equipment amounting to US$20 million and US$20 million was recorded for Kusasalethu and Masimong each. A loss of US$2 million was also recorded for Tshepong.

Foreign exchange translation loss (net)

Foreign exchange translation loss (net) increased from US$18 million in fiscal 2014 to US$32 million in fiscal 2015. The increase is primarily due to the foreign exchange translation loss relating to the translation of the US$ revolving credit facilities into Rand from US$15 million in fiscal 2014 to US$33 million in fiscal 2015. The Rand weakened by 15% from a closing rate of R10.61 in fiscal 2014 to R12.16 in fiscal 2015.

Loss from associate

The loss for fiscal 2015 follows the finalization of Rand Refinery's 2013 and 2014 financial statements which accounted for the known inventory discrepancy at that date. Harmony recorded a further US$2 million against the loan to Rand Refinery for its share of the loss. The inventory discrepancy arose from the implementation of a new Enterprise Resource Planning System by Rand Refinery. Harmony recognized a loss of US$12 million in fiscal 2014 to account for its share of this discrepancy.

Net gain on financial instruments

The gain of US$1 million in fiscal 2015 relates primarily to the fair value gain recognized on the ELDs held by the environmental trusts, which are classified as fair value through profit or loss investments. The gain recognized on the ELDs in fiscal 2014 was US$16 million. The decrease in fiscal 2015 compared to fiscal 2014 is mainly due to the maturity of the existing ELDs.

Income and mining taxes

In fiscal 2014 and 2015, the tax rates for companies were 34% for mining income and 28% for non-mining income for South African companies and 30% for Australian companies and PNG mining companies.

Income and mining tax	**2015**	**2014**
Effective income and mining tax rate	(14)%	(19)%

The effective tax rate for fiscal 2015 was lower than the mining statutory tax rate of 34% for us and our subsidiaries as a whole. The most significant items causing the group's income tax provision to differ from the mining statutory tax rate were there are no tax consequences relating to the impairment recorded on Hidden Valley, deferred tax assets not recognized which relates primarily to the Hidden Valley operation and the deferred tax credit resulting from the reduction in the average deferred tax rates at the South African operations mainly due to lower estimated profitability following the completion of the updated life-of-mine plans.

Deferred tax rates for the South African operations are calculated based on estimates of the future profitability of each ring-fenced mine when temporary differences will reverse. The future profitability of each ring-fenced mine, in turn, is determined by reference to the life-of-mine plan for that operation, which is based on parameters such as the Group's long term view of the US$ gold price and the Rand/US$ exchange rate, as well as the reserves declared for the operation. As some of these parameters are based on market indicators, they differ from one year to the next. In addition, the reserves may also increase or decrease based on updated or new geological information. Changes in the future profitability of each ring-fenced mine impact the deferred tax rates used to recognize temporary differences at these operations. See *"— Critical Accounting Policies and Estimates—Deferred taxes*" above. The decrease in deferred tax on temporary differences due to changes in estimated effective tax rates results primarily from a decrease in the effective deferred tax rate at Freegold (includes the Bambanani, Joel, Phakisa and Tshepong operations) and Randfontein Estates (includes the Doornkop and Kusasalethu operations) . The deferred tax rate at Freegold decreased from 20.3% in fiscal 2014 to 16.7% in fiscal 2015 and Randfontein Estates decreased from 18.9% to 14.3%, both decreases mainly due to the lower estimated profitability.

South Africa. We pay taxes separately on mining income and non-mining income. The amount of our South African mining income tax is calculated on the basis of a formula that takes into account our total revenue and profits from, and capital expenditure for, mining operations in South Africa. 5% of total mining revenue is exempt from taxation in South Africa as a result of the application of the gold mining formula. The amount of revenue subject to taxation is calculated by deducting qualifying capital expenditures from taxable mining income. The amount by which taxable mining income exceeds 5% of mining revenue constitutes taxable mining income. We and our subsidiaries each make our own calculation of taxable income.

Australia. Generally, Australia imposes tax on the worldwide income (including capital gains) of all of our Australian incorporated and tax resident entities. The current income tax rate for companies is 30%.

Harmony Gold (Australia) Proprietary Limited and its wholly-owned Australian subsidiary companies are recognized and taxed as a single entity. Under the consolidation rules all of the Australian subsidiary companies are treated as divisions of the Head Company, Harmony Gold Australia. As a result inter-company transactions between group members are generally ignored for tax purposes. This allows the group to transfer assets between group members without any tax consequences, and deems all tax losses to have been incurred by the Head Company of the group.

Withholding tax is payable on dividends, interest and royalties paid by Australian residents to non-residents, which would include any dividends on the shares of our Australian subsidiaries that are paid to us. In the case of dividend payments to non-residents, a 30% withholding tax applies. However, where the recipient of the dividend is a resident of a country with which Australia has concluded a double taxation agreement, the rate of withholding tax is generally limited to 15% (or in the case of South Africa 5% where the dividend is paid to a company which controls at least 10% of the Australian dividend paying company). Where dividends are fully franked, no withholding tax applies as an effective credit is allowed against any withholding tax otherwise payable, regardless of whether a double taxation agreement is in place. However, due to the tax profile of Harmony Gold Australia it is not expected to have any franking credits in the foreseeable future.

Where conduit foreign income received by an Australian company is paid from Australia as a dividend, it is not subject to dividend withholding tax.

Australia has a Controlled Foreign Company regime which effectively attributes certain types of passive income derived by offshore subsidiaries and taxes that income as if it had been derived in Australia under Australian tax rules.

PNG. The Hidden Valley mine in PNG commenced operations in fiscal 2010. We are also reviewing other potential projects and carrying out extensive exploration.

PNG mining projects are taxed on a project basis. Therefore each project is taxed as a separate entity, even though it may be one of a number of projects carried on by the same company. In certain circumstances there is an ability to transfer the tax benefit obtained through exploration expenditure between projects and wholly-owned companies. Tax losses are generally quarantined and cannot be transferred between projects.

PNG mining companies are taxed at a rate of tax of 30%. Mining operations in PNG are subject to a 2% royalty which is payable to the PNG Government.

Capital development and exploration expenditure incurred in PNG is capitalized for tax purposes and can be generally deducted at 25% per annum on a diminishing value basis against project income, with the deduction being limited to the lesser of 25% of the diminished value or the income of the project for the year.

PNG imposes dividend withholding tax of 10% on dividends paid by PNG mining operations to non-residents. Although PNG also imposes interest withholding tax on interest paid off-shore, the PNG Tax Act exempts interest paid to non-resident lenders from withholding tax where the PNG company is engaged in mining operations in PNG. These rates only apply once an entity has commenced mining and do not apply to entities at the exploration stage.

Other Financial Information

Export Sales

All of our gold produced in South Africa during fiscal 2014 to 2016 was refined by Rand Refinery. Rand Refinery is owned by a consortium of the major gold producers in South Africa and Harmony holds a 10.38% interest at June 30, 2016. All of our gold produced in PNG in those periods was sold to The Perth Mint Australia, a Perth-based refinery.

Recent Developments

See Item 4: *"Information on the Company—History and Development of the Company—Recent Developments—Developments since June 30, 2016.*"

B. LIQUIDITY AND CAPITAL RESOURCES

We centrally manage our funding and treasury policies. There are no legal or economic restrictions on the ability of our subsidiaries to transfer funds to us. We have generally funded our operations and our short-term and long-term liquidity requirements from: (i) cash generated from operations; (ii) credit facilities and other borrowings; and (iii) sales of equity securities.

	Fiscal year ended June 30,		
	2016	2015	2014
	($ in millions)		
Operating cash flows	312	176	219
Investing cash flows	(180)	(253)	(255)
Financing cash flows	(114)	15	16
Foreign exchange differences	(21)	(22)	(17)
Total cash flows	(3)	(84)	(37)

Operations

Net cash provided by operations is primarily affected by the quantities of gold sold, the gold price, the Rand-US dollar exchange rate, cash costs per ounce and, in the case of the International operations, the Australian dollar and Kina versus US dollar exchange rate. A significant adverse change in one or more of these parameters could materially reduce cash provided by operations as a source of liquidity.

Net cash generated by operations increased from US$176 million in fiscal 2015 to US$312 million in fiscal 2016. This was mainly due to the significant increase in the Rand gold price received due to the weakening of the Rand against the US dollar, which offset the decrease in gold sold in fiscal 2016, and increases in production costs due to increases in labor, materials and electricity and other inflationary pressures in fiscal 2016.

Net cash generated by operations decreased from US$219 million in fiscal 2014 to US$176 million in fiscal 2015. This was mainly due to the decrease in revenue which is attributable to the decrease in gold sold in fiscal 2015, increases in production costs due to increases in labor, materials and electricity and other inflationary pressures in fiscal 2015.

Investing

Net cash utilized by investing activities was US$180 million in fiscal 2016, as compared with US$253 million in fiscal 2015. Additions to property, plant and equipment were US$168 million in fiscal 2016 compared with US$246 million in fiscal 2015.

Net cash utilized by investing activities was US$253 million in fiscal 2015, as compared with US$255 million in fiscal 2014. Additions to property, plant and equipment were US$246 million in fiscal 2015 compared with US$254 million in fiscal 2014.

Financing

Financing activities utilized US$114 million in fiscal 2016, compared with US$15 million generated in fiscal 2015.

In fiscal 2016, we drew down US$24 million (2015: US$80 million). Loan repayments in fiscal 2016 amounted to US$138 million (2015: US$65 million and 2014: US$44 million). No dividends were paid in fiscal 2014, 2015 and 2016.

Outstanding Credit Facilities and Other Borrowings

On December 20, 2013, we entered into a loan facility with Nedbank, comprising a revolving credit facility of R1,300 million (US$126 million). Interest accrues on a day-to-day basis over the term of the loan at a variable interest rate. In January 2015, R400 million (US$35 million) was drawn down. During July 2015 an additional R300 million (US$24 million) was drawn down while in November 2015 R400 million (US$28 million) was repaid. At June 30, 2016, the remaining R1,000 million (US$68 million) on this facility is available until December 2016. On July 7, 2016, Harmony repaid the R300 million (US$20.0 million) outstanding on the facility.

On December 22, 2014, we entered into a loan facility agreement which was jointly arranged by Nedbank Limited and Barclays Bank Plc, comprising a revolving credit facility of up to US$250 million. All conditions precedent were met during February 2015 and US$205 million was drawn down to repay the syndicated revolving credit facility, resulting in a net cash outflow of US$65 million. The remaining US$45 million was drawn down during May 2015. During fiscal 2016, US$110 million was repaid. Interest accrues on a day-to-day basis over the term of the loan at a variable interest rate. The facility is repayable on maturity during February 2018. At June 30, 2016, the remaining US$110 million on this facility is available until February 2018.

We need to comply with certain debt covenants for both the Nedbank facility and US dollar revolving credit facility. The debt covenant tests were renegotiated during December 2014 and are as follows:

- The group's interest cover ratio shall not be less than five (EBITDA[1]/Total interest paid).
- Tangible Net Worth[2] to total net debt ratio shall not be less than six times or eight times when dividends are paid.
- Leverage[3] shall not be more than 2.5 times.

1 *EBITDA as defined in the agreement excludes unusual items such as impairment and restructuring cost.*

2 *Tangible Net Worth is defined as total equity less intangible assets.*

3 *Leverage is defined as total net debt to EBITDA.*

We complied with the relevant covenants during fiscal 2016.

Recently Retired Credit Facilities and Other Borrowings

On August 11, 2011, we entered into a loan facility arranged by Nedbank Limited and FirstRand Bank Limited (acting through its Rand Merchant Bank division) (syndicate), comprising a US$300 million syndicated revolving credit facility. The facility was utilized to fund exploration project in PNG. Interest at LIBOR plus 260 basis points, was paid quarterly. The syndicated revolving credit facility was repayable after three years. The outstanding amount on the syndicated revolving credit facility was settled in February 2015 by drawing against the new facility entered into on December 22, 2014.

Capital Expenditures

Total budgeted capital expenditures for fiscal 2017 are US$200 million. See "*Item 4 – Information On The Company – Business Overview – Capital Expenditures" for* details regarding the budgeted capital expenditures for each operation. We currently expect that our planned operating capital expenditures will be financed from operations, including use of our current facilities, as described in "*—Outstanding Credit Facilities and Other Borrowings" above*, and new borrowings as needed.

The following table sets forth our authorized capital expenditure as of June 30, 2016:

	$'million
Authorized and contracted for[(1)]	18
Authorized but not yet contracted for	35
Total	53

[(1)]Including our share of the PNG joint venture's capital expenditure of US$4 million.

Working Capital and Anticipated Financing Needs

The board believes that our working capital resources, by way of cash generated from operations, borrowings and existing cash on hand, are sufficient to meet our present working capital needs. The South African operations are generally expected to fund their capital internally. The Golpu project in PNG is, however, expected to require additional capital expenditure over the next three to six years to complete construction, most of which will be funded from cash generated by operations and the balance by debt. We may also consider other options or structures to finance Golpu. For more information on our planned capital expenditures, see "*—Capital Expenditure*" above. Also see *"Item 3: "Risk Factors—To maintain gold production beyond the expected lives of Harmony's existing mines or to increase production materially above projected levels, Harmony will need to access additional reserves through exploration or discovery"*. Our board believes that we will have access to adequate financing on reasonable terms given our cash-based operations and modest leverage. Our ability to generate cash from operations could, however, be materially adversely affected by increases in cash costs, decreases in production, decreases in the price of gold and appreciation of the Rand and other non-US$ currencies against the US dollar. In addition, South African companies are subject to significant exchange control limitations, which may impair our ability to fund overseas operations or guarantee credit facilities entered into by overseas subsidiaries. See *Item 10: "Additional Information—Exchange Controls".*

The information set forth under the headings:

- *"—Harmony in Action—Operational performance—Outlook for FY17*" on page 84

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

D. TREND INFORMATION

The information set forth under the headings:

- *"—Harmony in Action—Operational performance*" on pages 81 to 82 and pages 86 to 109

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

E. OFF-BALANCE SHEET ARRANGEMENTS

Our obligation with regards to operating leases is US$0.17 million and relates to the offices in Brisbane and PNG. This amount at June 30, 2016 is due within 12 months. Contractual obligations in respect of mineral tenement leases in PNG amount to US$17 million at June 30, 2016.

F. TABULAR DISCLOSURE OF CONTRACTUAL OBLIGATIONS

Our contractual obligations and commercial commitments consist primarily of credit facilities, post-retirement healthcare and environmental obligations.

Contractual Obligations on the Balance Sheet

The following table summarizes our contractual obligations as of June 30, 2016:

	Payments Due by Period				
	Total ($'million)	Less Than 12 Months July 1, 2016 to June 30, 2017 ($'million)	12-36 Months July 1, 2017 to June 30, 2019 ($'million)	36-60 Months July 1, 2019 To June 30, 2021 ($'million)	After 60 Months Subsequent June 30, 2021 ($'million)
Bank facilities[(1)]	170	27	143	—	—
Non-current liabilities[(2)]	1	—	1	—	—
Post-retirement health care[(3)]	11	—	—	—	11
Environmental obligations[(4)]	148	—	—	—	148
Total contractual obligations	330	27	144	—	159

(1) See Item 5: *"Operating and Financial Review and Prospects—Liquidity and Capital Resources—Outstanding Credit Facilities and Other Borrowings"*.

(2) This liability relates to the Sibanye Beatrix ground swap royalty provision. See note 26 to our consolidated financial statements set forth beginning on page F-1.

(3) This liability relates to post-retirement medical benefits of Freegold employees at the time of acquisition as well as for former employees who retired prior to December 31, 1996 and is based on actuarial valuations conducted during fiscal 2016.

(4) We make provision for environmental rehabilitation costs and related liabilities based on management's interpretations of current environmental and regulatory requirements. See Item 5: *"Operating and Financial Review and Prospects—Critical Accounting Policies—Provision for environmental rehabilitation"*.

Commercial Commitments

The following table provides details regarding our commercial commitments as of June 30, 2016:

	Amount of Commitments Expiring by Period				
	Total ($'million)	Less Than 12 Months July 1, 2016 to June 30, 2017 ($'million)	12-36 Months July 1, 2017 to June 30, 2019 ($'million)	36-60 Months July 1, 2019 To June 30, 2021 ($'million)	After 60 Months Subsequent June 30, 2021 ($'million)
Guarantees[(1)]	34	—	—	—	34
Capital commitments[(2)]	18	18	—	—	—
Total commitments expiring by period	51	18	—	—	33

(1) US$33 million of these guarantees relate to our environmental and rehabilitation obligation.

(2) Capital commitments consist only of amounts committed to external suppliers, although a total of US$35 million has been approved by the board for capital expenditures.

G. SAFE HARBOR

The information set forth under the heading *"Cautionary statement about forward-looking statements"* on the inside front cover is incorporated herein by reference.

ITEM 6. DIRECTORS, SENIOR MANAGEMENT AND EMPLOYEES

A. DIRECTORS AND SENIOR MANAGEMENT

The information set forth under the heading:

- *"Board of directors" and "Executive management"* on pages 19 to 24

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

B. COMPENSATION

The information set forth under the heading:

- *"—Governing Harmony—Remuneration report"* on pages 134 to 146

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

C. BOARD PRACTICES

The information set forth under the headings:

- *"—Governing Harmony—Corporate governance"* on pages 124 to 133;
- *"—Governing Harmony—Remuneration report"* on pages 134 to 146; and
- *"—Governing Harmony—Audit and risk committee chairman's report"* on pages 147 to 148

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

D. EMPLOYEES

The information set forth under the heading:

- *"—Harmony in Action—Employees and communities"* on pages 48 to 58

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

E. SHARE OWNERSHIP

The information set forth under the headings:

- *"—Governing Harmony—Remuneration report"* on pages 134 to 146; and
- *"—Shareholder information"* on pages 149 to 151

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

ITEM 7. MAJOR SHAREHOLDERS AND RELATED PARTY TRANSACTIONS

A. MAJOR SHAREHOLDERS

We are an independent gold producer, with no single shareholder exercising control. As of October 19, 2016, our issued share capital consisted of 437,479,029 ordinary shares. To our knowledge, (a) we are not directly or indirectly owned or controlled: (i) by another corporation; or (ii) by any foreign government, and (b) there are no arrangements (including any announced or expected takeover bid), the operation of which may at a subsequent date result in a change in our control.

The voting rights of our major shareholders do not differ from the voting rights of other holders of the same class of shares.

Significant changes in the percentage ownership held by major shareholders in the past three years are described below under "*—Related Party Transactions*".

A list of the holders that hold 5% or more of our securities as of September 30, 2016 is set forth below:

Holder	Number of Shares	Percentage
Deutsche Bank Trust Company Americas [(1)].............	197,695,031	45.19%
Van Eck Global [(2)]	64,548,943	14.75%
ARM Ltd. [(3)]..	63,632,922	14.55%
Private Investors (North America) [(4)]	38,922,362	8.90%
Allan Gray Unit Trust Management Ltd.	32,650,472	7.46%
Public Investment Corporation of South Africa	31 594 882	7.22%

(1) Deutsche Bank Trust Company Americas has acted as the depositary ("**Depositary**") with respect to the ADSs evidenced by ADRs as of October 10, 2011. Holding disclosed represents outstanding ADRs on September 30, 2016.

(2) Van Eck's holding of is held in in the form of ADRs and is included in (1) above.

(3) Patrice Motsepe, our Chairman, has an indirect holding in ARM Limited.

(4) Private Investors (North America)'s holding includes held in ADR form and is included in (1) above.

B. RELATED PARTY TRANSACTIONS

See note 32 "*Related Parties*", note 18 (c) "*Trade and other receivables*", note 19 *"Investments in Associates"* and note 20 *"Investment in Joint Operations"* of our consolidated financial statements, set forth beginning on page F-1.

C. INTERESTS OF EXPERTS AND COUNSEL

Not applicable.

ITEM 8. FINANCIAL INFORMATION

A. CONSOLIDATED STATEMENTS AND OTHER FINANCIAL INFORMATION

Please refer to Item 18: *"Financial Statements and Item 3: "Key Information—Selected Financial Data"*.

Legal Proceedings

None of our properties is the subject of pending material legal proceedings. We have experienced a number of claims and legal and arbitration proceedings incidental to the normal conduct of our business, such as the ones described below.

Silicosis (and other occupational diseases)

AngloGold Ashanti court case

On March 3, 2011, judgment was handed down in the Constitutional Court, in the case of Mr Thembekile Mankayi v AngloGold Ashanti Limited regarding litigation in terms of the ODIMWA. The judgment allows claimants, such as Mr Mankayi, to institute action against their current and former employers for damages suffered as a result of them contracting occupational diseases which result from their exposure to harmful quantities of dust while they were employed at a controlled mine as referred to in ODIMWA. In this regard, should anyone bring similar claims against Harmony in future, those claimants would need to prove that silicosis, as an example, was contracted while in the employ of the Company and that it was contracted due to negligence on the Company's part to provide a safe and healthy working environment. The link between the cause (negligence by the Company in exposing the claimant to harmful quantities of dust while in its employ) and the effect (the silicosis) will be an essential part of any case.

If Harmony, or any of its subsidiaries were to face a significant number of such claims and the claims were suitably established against it, the payments of compensation of the claims could have a material adverse effect on Harmony or the group's results of operations and financial position. In addition, Harmony or the group may incur significant additional costs arising out of these issues, including costs relating to the payment of fees, levies or other contributions in respect of compensatory or other funds established (if any), and expenditures arising out of its efforts to resolve any outstanding claims or other potential action.

Consolidated class action

On August 23, 2012, Harmony and certain of its subsidiaries (Harmony defendants) were served with court papers in terms of which three former employees made application to the South Gauteng High Court to certify a class for purposes of instituting a class action against the Harmony defendants. In essence, the applicants want the court to declare them as suitable members to represent a class of current and former mineworkers for purposes of instituting a class action for certain relief and to obtain directions from the court as to what procedure to follow in pursuing the relief required against the Harmony defendants. Similar applications were also brought against various other gold mining companies for similar relief during August 2012.

On January 8, 2013, the Harmony defendants, alongside other gold mining companies operating in South Africa (collectively the respondents), was served with another application to certify two classes of persons representing a class of current and former mine workers who work or have worked on gold mines owned and/or controlled by the respondents and who allegedly contracted silicosis and/or other occupational lung diseases, and another class of dependents of mine workers who have died of silicosis and who worked on gold mines owned and/or controlled by the respondents. The Harmony defendants opposed both applications and instructed its attorneys to defend the application.

Following receipt of the aforesaid application, the Harmony defendants were advised that there was a potential overlap between the application of August 23, 2012 and the application of January 8, 2013. On October 17, 2013, the five certification applications were consolidated by order of court.

The applications were heard in October 2015. On May 13, 2016, the Johannesburg High Court ordered the certification of a silicosis class and a tuberculosis class, which are to proceed as a single class against the mining companies acted in the application. The companies requested leave to appeal to the Supreme Court of Appeal, which was granted on by the Supreme Court of Appeal on September 13, 2016. Harmony submitted its notice of appeal in respect of the transmissibility of the general damages order on July 22, 2016.

Anglo American South Africa, AngloGold Ashanti, Gold Fields, Sibanye and Harmony (the companies) announced in November 2014 that they have formed a gold mining industry working group to address issues relating to the compensation and medical care for occupational lung diseases in the gold mining industry in South Africa. Essentially, the companies are seeking a comprehensive and sustainable solution which deals both with the legacy compensation issues and future legal frameworks which, while being fair to employees, also ensures the future sustainability of companies in the industry. The companies have engaged all stakeholders on these matters, including government, organised labour, other mining companies and legal representatives of claimants who have filed legal suits against the companies.

The companies have engaged all stakeholders on these matters, including government, organised labour, other mining companies and legal representatives of claimants who have filed legal suits against the companies.

Due to the limited information available on the above claim and potential other claims, and the uncertainty of the outcome of the matter, no costs estimation can as yet be made for the possible obligation.

Individual claims

On May 3, 2013, Harmony and one of its subsidiaries received a summons from Richard Spoor Attorneys on behalf of a former employee. The plaintiff is claiming US$1.7 million in damages plus interest from Harmony and one of its subsidiaries, and another gold mining group of companies. The plaintiff alleges to have contracted silicosis with progressive massive fibrosis during the course of his employment. At this stage, and in the absence of a court decision on this matter, it is not yet certain as to whether the Company will incur any costs (except legal fees) related to the above claim.

Due to the limited information available on the above claims and potential other claims, and the uncertainty of the outcome of the consolidated class certification application, no costs estimation can as yet be made for the possible obligation.

Watut River damage claims

Legal proceedings commenced in December 2010 against the Hidden Valley mine in PNG over alleged damage to the Watut River (which runs adjacent to the Hidden Valley mine), alleged to have been caused by waste rock and overburden run-off from the mine. The damages sought by the plaintiffs were not specified. The defendants intend to defend the claims. No active steps have been taken by the plaintiffs in this proceeding for more than five years. It is not practicable to make any reasonable assessment of the prospects of the plaintiffs succeeding should they proceed with these claims, nor the potential liability of the defendants if the plaintiffs were to succeed. As a result, no provision has been recognized in the financial statements for this matter.

B. SIGNIFICANT CHANGES

See Item 4: "*Information on the Company—History and Development of the Company—Recent Developments—Developments since June 30, 2016*."

ITEM 9 THE OFFER AND LISTING

A. OFFER AND LISTING DETAILS

The information set forth under the heading:

- *"Shareholder information"* on pages 149 to 150

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

As of October 19, 2016, there were 1,689 record holders of our 204,046,125 ADRs in the United States.

The high and low sales prices in Rand for our ordinary shares on the JSE for the periods indicated were as follows:

	Harmony Ordinary Shares (Rand per Ordinary Share)	
	High	**Low**
Fiscal year ended June 30, 2012		
Full Year	115.75	72.84
Fiscal year ended June 30, 2013		
First Quarter	85.71	67.50
Second Quarter	74.05	65.20
Third Quarter	75.64	53.40
Fourth Quarter	58.25	33.47
Full Year	85.71	33.47
Fiscal year ended June 30, 2014		
First Quarter	42.47	32.74
Second Quarter	36.14	24.48
Third Quarter	40.32	27.25
Fourth Quarter	35.60	27.72
Full Year	42.47	24.48
Fiscal year ended June 30, 2015		
First Quarter	35.21	24.70
Second Quarter	24.15	17.00

	Harmony Ordinary Shares (Rand per Ordinary Share)	
	High	**Low**
Third Quarter	35.50	20.47
Fourth Quarter	24.34	15.59
Full Year	35.50	15.59
Fiscal year ended June 30, 2016		
July 2016	65.17	54.77
August 2016	66.65	52.44
September 2016	56.27	45.72
As of October 19, 2016	47.05	40.10

On October 19, 2016, the share price of our ordinary shares on the JSE was R45.00.

Our ADSs, evidenced by ADRs, are listed on the NYSE The high and low sales prices in US dollars for our ADRs for the periods indicated, as reported on the NYSE were as follows:

	NYSE Harmony ADRs ($ per ADR)	
	High	**Low**
Fiscal year ended June 30, 2012		
Full Year	14.87	8.70
Fiscal year ended June 30, 2013		
First Quarter	10.34	8.21
Second Quarter	8.96	7.50
Third Quarter	8.96	5.94
Fourth Quarter	6.38	3.30
Full Year	10.34	3.30
Fiscal year ended June 30, 2014		
First Quarter	4.33	3.30
Second Quarter	3.67	2.36
Third Quarter	3.77	2.36

	NYSE Harmony ADRs ($ per ADR)	
	High	**Low**
Fourth Quarter	3.34	2.52
Full Year	4.33	2.36
Fiscal year ended June 30, 2015		
First Quarter	3.29	2.16
Second Quarter	2.23	1.53
Third Quarter	3.18	1.67
Fourth Quarter	2.53	1.31
Full Year	3.29	1.31
Fiscal year ended June 30, 2016		
July 2016	4.72	3.74
August 2016	4.87	3.52
September 2016	4.14	3.27
As of October 19, 2016	3.37	3.20

On October 19, 2016, the closing share price of our ADRs on the NYSE was US$3.23.

B. PLAN OF DISTRIBUTION

Not applicable.

C. MARKETS

The information set forth under the heading:

- *"—Shareholder information"* on pages 149 to 151

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

The Securities Exchange in South Africa

The JSE is the sixth largest emerging market exchange and by far the leading exchange in Africa, playing a leadership role in the continent, supporting South Africa's role as the African financial hub. It is also recognized as a leading exchange in the global resources sector.

As South Africa's only full service securities exchange, the JSE connects buyers and sellers in five different markets: equities, which includes a primary and secondary board, equity derivatives, agricultural derivatives and interest rate instruments. The JSE is one of the top 20 exchanges in the world in terms of market capitalization. The market capitalization of the JSE equities market was R15,332 billion (US$1,042 billion) at June 30, 2016. The mining market capitalization was R1,679 billion (US$114 billion) at June 30, 2016, 11% of the overall JSE market capitalization and constituted 29% in terms of value traded.

Strate Settlement

Under Strate, South Africa's Central Securities Depository ("**CSD**"), there are essentially two types of clients: controlled and non-controlled. A controlled client is one who elects to keep his shares and cash with his broker and these shares are held in custody at the broker's chosen Custodian Bank, the CSD Participant ("**CSDP**"). A non-controlled client is one who appoints his own CSDP to act as custodian on his behalf. Equity settlements take place on a contractual T+3 (where T= trade date) settlement cycle. Securities and funds become due for settlement three business days after the trade. Contractual settlement is a market convention embodied in the rules of the JSE which states that a client has a contractual obligation to cause a JSE trade to settle on settlement day. The JSE, in its capacity as Settlement Authority, ensures that all on-market trades entered into by two JSE member firms settle three days after the trade date.

D. SELLING SHAREHOLDERS

Not applicable.

E. DILUTION

Not applicable.

F. EXPENSES OF THE ISSUE

Not applicable.

ITEM 10. ADDITIONAL INFORMATION

A. SHARE CAPITAL

The information set forth under the heading:

- *"—Shareholder information"* on pages 149 to 152

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

B. MEMORANDUM OF INCORPORATION

Information on our Memorandum of Incorporation can be found in Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2014 which was filed with the SEC on October 23, 2014, is available on the SEC's website and is incorporated herein by reference.

C. MATERIAL CONTRACTS

Neither the Company nor any member of the group of which it is a party has entered into any material contracts, other than in the ordinary course of its business, during the two years immediately preceding the publication of this document.

D. EXCHANGE CONTROLS

Introduction

The following is a general outline of South African exchange controls. Investors should consult a professional adviser pertaining to the exchange control implications of their particular investments.

The Republic of South Africa's exchange control regulations provide for restrictions on the exportation capital from a Common Monetary Area member, consisting of South Africa, the Republic of Namibia and the Kingdoms of Lesotho and Swaziland. Transactions between South African residents (including corporations) and foreigners are subject to these exchange controls, which are administered by the Financial Surveillance Department of the South African Reserve Bank ("**SARB**").

Since 1995 a number of exchange control regulations have been relaxed with regard to both residents and non-residents. Following the initial reforms, ongoing relaxations have been introduced with the aim of achieving a macroprudential risk based approach to the management of foreign exchange. The reforms are being made to, among other things, enable international firms to make investments through South Africa to the rest of Africa and to further enhance opportunities for offshore portfolio diversification for resident investors. In addition, the relaxations have also significantly raised the size of the discretionary allowances available to residents for overseas transactions.

A considerable degree of flexibility is built into the system of exchange controls, and the SARB possesses substantial discretionary powers in approving or rejecting the applications that fall outside the authority granted to authorized dealers.

These comments relate to exchange controls in force at June 30, 2016. These controls are subject to change at any time, however, the government has previously announced most changes during the annual budget statement in February. It is not possible to predict whether existing exchange controls will be changed by the South African government in the future.

Government Regulatory Considerations

Shares

A foreign investor may invest freely in shares in a South African company, whether listed on the JSE or not through normal banking channels against settlement in foreign currency or Rand from a non-resident rand account. A foreign investor may also sell his or her share investment in a South African company and transfer the proceeds out of South Africa without restriction. However, when the Company is not listed on the JSE, the SARB must be satisfied that the sale price of any shares reflects fair market value.

Under present South African exchange control regulations, our ordinary shares and ADSs are freely transferable outside the Common Monetary Area between non-residents of the Common Monetary Area. No prior SARB approval is required for the transfer of proceeds to South Africa, in respect of shares listed on the JSE, provided these funds enter the country through the normal banking channels. In addition, the proceeds from the sale of ordinary shares on the JSE on behalf of those holders of ordinary shares who are not residents of the Common Monetary Area are freely remittable to those holders. Share certificates and warrant certificates held by non-residents will be endorsed with the words "non-resident."

Loans

Generally, the granting of loans to us or our subsidiaries, and our ability to borrow from non-South African sources and the repatriation of dividends, interest and royalties by us will be regulated by the Exchange Control Department of the SARB. If a foreign investor wishes to lend capital to a South African company, the prior approval of the SARB must be sought mainly in respect of the interest rate and terms of repayment applicable to such loan.

Interest on foreign loans is subject to a withholding tax of 15% and freely remittable abroad, provided the loans received prior approval from the SARB. However, this rate may be reduced depending on the applicability of a double taxation treaty.

Investments

We are required to seek approval from the SARB to use funds held in South Africa to make investments outside of South Africa.

Dividends

Dividends declared by a quoted company are subject to a withholding tax of 15% and freely transferable out of South Africa from both trading and non-trading profits earned in South Africa through a major bank as agent for the SARB to non-resident shareholders. However, this rate may be reduced depending on the applicability of a double taxation treaty.

Where 75% or more of a South African company's capital, voting power, power of control or earnings is directly or indirectly controlled by non-residents, such a company is designated an "affected person" by the SARB, and certain restrictions are placed on its ability to obtain local financial assistance. We are not, and have never been, designated an "affected person" by the SARB.

If an affected entity made use of local borrowing facilities, the affected entity must apply for SARB approval prior to remitting dividends offshore. As a general rule, an affected entity that has accumulated historical losses may not declare dividends out of current profits unless and until such time that the affected entity's local borrowings do not exceed the local borrowing limit.

E. TAXATION

Certain South African Tax Considerations

The discussion set out in this section is based on current law and our interpretation thereof. Amendments to the law may change the tax treatment of acquiring, holding or disposing of our ordinary shares or ADSs, as applicable, which changes may possibly occur on a retrospective basis. The following summary is not a comprehensive description of all of the tax considerations that may be relevant to a decision to purchase, own or dispose of our ordinary shares or ADSs, and does not cover the tax consequences that depend upon your particular tax circumstances. This summary is not intended to be tax advice. In particular, the following summary addresses tax consequences for holders of ordinary shares or ADSs who are not residents of South Africa for tax purposes from a South African perspective. It specifically excludes the tax consequences for persons who are not residents of South Africa for tax purposes whose holding of shares or ADSs is effectively connected with a permanent establishment in South Africa through which the holder carries on business activities, or who is not the beneficial recipient of the dividends, or where the source of the transaction or dividends is deemed to be in South Africa. In addition, it does not cover the tax consequences for a holder that is not entitled to the benefits of the double taxation agreement concluded between the Republic of South Africa and the United States of America signed on February 17, 1997 ("**US Treaty**"). It also assumes that the holders hold the ordinary shares or ADSs on capital account (that is, for investment purposes) as opposed to on revenue account (that is for speculative purposes, as trading stock). Recently the Supreme Court of Appeal in South Africa indicated that gains will be on revenue account if they are derived as part of a business in carrying out a scheme of profit making. We recommend that you consult your own tax adviser concerning the consequences of holding our ordinary shares or ADSs, as applicable, in your particular situation.

Dividends

With effect from April 1, 2012, South Africa introduced a Dividends Tax, which is a withholding tax on dividends borne by the shareholder receiving the dividend. The rate at which Dividends Tax is levied is 15%. Dividends Tax is imposed on, amongst others, non-resident shareholders, and it is withheld by the company declaring and paying the dividend to its shareholders or the regulatory intermediary, as the case may be, as a withholding agent.

Article 10 of the US Treaty provides that a dividend paid by a company that is a resident of South Africa for tax purposes to a resident of the US for tax purposes may be taxed in the US. Article 10 of the US Treaty further provides that such a dividend may also be taxed in South Africa. However, the tax charged in South Africa may not exceed 5% of the gross amount of the dividends if the beneficial owner is a company that holds directly at least 10% of the voting stock of the South African company paying the dividends. In all other cases, the US Treaty provides for a withholding tax of 15% of the gross amount of the dividends.

With effect from January 1, 2012 it is deemed that an amount will be derived by a person from a source within South Africa if the amount constitutes a dividend received by or accrued to that person.

Capital Gains Tax

Capital Gains Tax ("**CGT**") was introduced in South Africa with effect from October 1, 2001. In the case of an individual, 40% in respect of years of assessment commencing 1 March 2016 (previously 33.3%) of the capital gain is included in the individual's taxable income (effectively 16.4% (previously 13.65%) should the individual pay tax at the marginal rate). In the case of a corporate entity or trust, 80% in respect of years of assessment commencing 1 March 2016 (previously 66.6%) of such gain is included in its taxable income (effectively a rate of 22.4% (previously 18.6%) for a corporate entity and 32.8% (previously 27.3%) for a trust). CGT is only applicable to non-residents if the proceeds from the sale are attributable to a permanent establishment of the non-resident shareholder. The US Treaty (which will prevail in the event of a conflict) provides that the US holder of ordinary shares or ADSs will not be subject to CGT if the assets have been held as capital assets, unless they are linked to a permanent establishment of such non-resident shareholder in South Africa. To the extent that shares or ADSs are held on revenue account, a similar principle applies with reference to the payment of income tax. Accordingly, income tax is only payable to the extent that the gain is attributable to the carrying on of a business in South Africa through a permanent establishment situated in South Africa. The current corporate rate is equal to 28%. Any gains realized on the disposal of equity shares are automatically deemed to be of a capital nature if the equity shares have been held for a continuous period of at least three years. Such provision applies automatically and is not elective. However, this deeming provision does not include an ADS.

Generally the domestic laws of South Africa provide that an amount received or accrued in respect of the disposal of an asset that constitutes immovable property held by that person or any interest or right of whatever nature of that person to or in intellectual property where that property is situated in South Africa is deemed to have been sourced in South Africa and be subject to South African tax. It includes the disposal of any equity shares held by a person in a company if:

- 80% or more of the market value of the equity shares, ownership or right to ownership or vested interest, as the case may be, at the time of disposal thereof is attributable directly or indirectly to immovable property held otherwise than as trading stock; and
- the person directly or indirectly holds at least 20% of the equity shares in the company or ownership or right to ownership of the other entity.

The provisions of the US Treaty override the deemed source rules to the extent applicable. Article 13 of the US Treaty provides that South Africa is entitled to tax a gain that is attributable to the alienation of real property situated in South Africa, which concept includes the equivalent of a US real property interest, even if held through means of shares.

Securities Transfer Tax

Security Transfer Tax ("**STT**") is payable in respect of the transfer of any security issued by a South African company. STT is levied at a rate of 0.25% of the taxable amount of the security concerned (generally the market value). A security is defined to include a depository receipt in a company, in addition to shares in a company. STT is not payable on the issue of any security.

Although ADSs in respect of our shares are not listed on the JSE, reference is specifically made to the transfer of depository receipts in a South African company. As a consequence, STT will therefore be payable on the transfer of ADSs. In addition, the process of depositing shares listed on the JSE in return for ADSs, or withdrawing such shares from the deposit facility, may attract STT as and when the shares are transferred to or from the depository institution.

STT is payable by the broker or participant if a transaction is effected through a stockbroker or an exchange participant, but it may be recovered from the person acquiring the beneficial ownership of the rights concerned. In other instances, STT is payable by the person acquiring beneficial ownership.

STT is also payable on the subsequent redemption or cancellation of shares or ADSs.

Interest

South Africa has imposed a withholding tax on interest paid by any person to or for the benefit of any foreign person to the extent that the interest is regarded as having been received or accrued from a source within South Africa at the rate of 15% with effect from March 1, 2015. In terms of the US Treaty this rate is reduced to zero. However, the rate may change to 5% or 10% once the US Treaty is renegotiated.

Withholding tax on Service Fees

The proposed withholding tax on service fees at the rate of 15% was withdrawn in the 2016 Budget. The withholding tax on service fees has apparently introduced unforeseen issues, including uncertainty on the application of domestic tax law and taxing rights under tax treaties. The withholding tax on service fees is rather now dealt by way of the fact that these types of arrangements must be reported. Transactions between residents and non-residents must thus be reported if they relate to consultancy, construction, engineering, installation, logistical, managerial, supervisory, technical or training services, in circumstances where the expenditure exceeds or is anticipated to exceed R10 million in aggregate and does not otherwise qualify as remuneration.

Capitalization Shares

Capitalization shares issued to holders of shares in lieu of cash dividends are currently not subject to Dividends Tax. However, these shares have a base cost of zero.

Voting Rights

There are no limitations imposed by South African law or by our charter on the right of non-resident or foreign owners to hold or vote our ordinary shares.

Certain Material United States Federal Income Tax Considerations

Except as described below under the heading "—Non-US Holders," the following is a discussion of certain material US federal income tax consequences for a US holder of purchasing, owning, and disposing of the ordinary shares (for purposes of this summary, references to the ordinary shares include the ADSs, unless the context otherwise requires).

You will be a "**US holder**" if you are a beneficial owner of ordinary shares and you are:

- an individual who is a citizen or resident of the United States;
- a corporation (or other entity taxable as a corporation for US federal income tax purposes) organized under the laws of the United States, any state thereof, or the District of Columbia;
- an estate whose income is subject to US federal income tax regardless of its source; or
- a trust if: (i) a US court can exercise primary supervision over the trust's administration and one or more US persons are authorized to control all substantial decisions of the trust or (ii) it has a valid election in effect under applicable US Treasury regulations to be treated as a US person.

A "**non-US holder**" is a beneficial owner of ordinary shares that is not a US holder for US federal income tax purposes. If you are a "non-US holder," the discussion below under "Non-US Holders" will apply to you.

This summary is based on the US Internal Revenue Code of 1986, as amended, (the "**Code**"), its legislative history, existing and proposed US Treasury regulations, published Internal Revenue Service rulings, and court decisions that are now in effect, any and all of which are subject to differing interpretations and which could be materially and adversely changed. Any such change could apply retroactively and could affect the continued validity of this summary. This summary does not consider the potential effects, both adverse and beneficial, of any proposed legislation which, if enacted, could be applied, possibly on a retroactive basis, at any time.

This summary does not purport to be a comprehensive description of all of the tax considerations that may be relevant to a decision to purchase the ordinary shares. In particular, this summary deals only with US holders that will hold the ordinary shares as capital assets within the meaning of Section 1221 of the Code. It does not address considerations that may be relevant to you if you are an investor that is subject to special tax rules, such as a bank, real estate investment trust, regulated investment company, insurance company, dealer in securities or currencies, trader in securities or commodities that elects mark-to-market treatment, person that will hold the ordinary shares as a hedge against currency risk or as a position in a "straddle" or conversion transaction, tax-exempt organization, person whose "functional currency" is not the US dollar, person liable for alternative minimum tax, or a person who owns directly, indirectly or by attribution, at least 10% of our stock. This summary also does not address any aspect of US federal non-income tax laws, such as gift or estate tax laws, or state, local, or non-US tax laws, or, except as discussed below, any tax reporting obligations of a holder of our ordinary shares.

If a partnership (including for this purpose any entity treated as a partnership for US federal income tax purposes) is a beneficial owner of the ordinary shares, the US federal income tax treatment of a partner in the partnership generally will depend on the status of the partner and the activities of the partnership. A holder of the ordinary shares that is a partnership and partners in such a partnership should consult their own tax advisors about the US federal income tax consequences of acquiring, holding, and disposing of the ordinary shares.

In general, if you hold ADSs, you will be treated as the holder of the ordinary shares represented by those ADSs for US federal income tax purposes.

We believe that we will not be a passive foreign investment company ("**PFIC**"), for US federal income tax purposes for the current taxable year. However, we cannot assure you that we will not be considered a PFIC in the current or future years. The determination whether or not we are a PFIC is a factual determination that is based on the types of income we earn and the value of our assets and cannot be made until the close of the applicable tax year. If we were currently or were to become a PFIC, US holders of ordinary shares would be subject to special rules and a variety of potentially adverse tax consequences under the Code.

Each prospective purchaser should consult his or her tax advisor with respect to the United States federal, state, local and foreign tax consequences of acquiring, owning, or disposing of shares or ADSs.

Taxation of Distributions Paid on Ordinary Shares

Subject to the discussion in "—Passive Foreign Investment Company Rules" below, under US federal income tax laws, if you are a US holder, the gross amount of dividends that you receive in cash (or that are part of a distribution that any shareholder has the right to receive in cash) in respect of the ordinary shares generally will be subject to US federal income taxation as dividend income to the extent paid out of our current or accumulated earnings and profits (as determined for US federal income tax purposes). You must include the amount of any South African tax withheld from the dividend payment in this gross amount even though you do not in fact receive it. Dividends received by certain non-corporate US holders will generally be taxed at a maximum rate of 20%, where certain holding period and other requirements are satisfied, if such dividends constitute qualified dividend income. Qualified dividend income includes dividends paid by a "qualified foreign corporation", and we believe that we are, and will continue to be, a "qualified foreign corporation" for US federal income tax purposes. Holders of ordinary shares should consult their own tax advisors regarding the availability of the reduced dividend tax rate in light of their own particular circumstances. Dividends will not be eligible for the dividends-received deduction generally allowed to US corporations in respect of dividends received from certain US corporations.

Dividends paid in South African Rand will be included in your gross income in a US dollar amount calculated by reference to the exchange rate in effect on the day you receive (or the depository receives, in the case of the ADSs) the dividend, regardless of whether the payment is in fact converted into US dollars. If the foreign currency received as a dividend is not converted into US dollars on the date of receipt, a US holder will have a basis in the foreign currency equal to its US dollar value on the date of receipt. Generally, any gain or loss resulting from currency exchange fluctuations during the period from the date you include the dividend payment in income to the date you convert the payment into US dollars will be treated as ordinary income or loss. The gain or loss generally will be income or loss from sources within the United States for foreign tax credit limitations. You should generally not be required to recognize any foreign currency gain or loss to the extent such dividends paid in South African Rand are converted into US dollars immediately upon receipt by the applicable party. If we distribute non-cash property as a dividend, you generally will include in income an amount equal to the fair market value of the property, in US dollars, on the date that it is distributed. Subject to certain limitations, a US holder may be entitled to a credit or deduction against its US federal income taxes for the amount of any South African taxes that are withheld from dividend distributions made to such US holders. The decision to claim either a credit or deduction must be made annually and will apply to all foreign taxes paid by the US holder to any foreign country or US possession with respect to the applicable tax year.

Dividends received from us will generally be income from non-United States sources, for US foreign tax credit purposes, subject to various classifications and other limitations. The rules relating to computing foreign tax credits are complex. You should consult your own tax advisor to determine the foreign tax credit implications of owning ordinary shares.

Distributions in excess of current and accumulated earnings and profits, as determined for US federal income tax purposes, will be treated as a non-taxable return of capital to the extent of your basis in the ordinary shares and, to the extent in excess of such basis, will be treated thereafter as capital gain from the sale or exchange of such ordinary shares.

Taxation of the Disposition of Ordinary Shares

Subject to the discussion in "—Passive Foreign Investment Company Rules" below, if you are a US holder and you sell or otherwise dispose of your ordinary shares, you will recognize capital gain or loss in an amount equal to the difference between the US dollar value of the amount you receive on the sale and your adjusted tax basis in the ordinary shares, determined in U.S dollars. Such gain or loss generally will be long-term capital gain or loss if you held the ordinary shares for more than one year. After January 1, 2013, long-term capital gain recognized by a non-corporate US holder is generally subject to a maximum tax rate of 15% but may be as high as 20%. In general, any capital gain or loss recognized upon the sale or exchange of ordinary shares will be treated as US source income or loss, as the case may be, for US foreign tax credit purposes. Your ability to offset capital losses against income is subject to limitations.

Deposits and withdrawals of ordinary shares by US holders in exchange for ADSs will not result in the realization of gain or loss for US federal income tax purposes.

To the extent that you incur South African securities transfer tax in connection with a transfer or withdrawal of ordinary shares as described under *"— Certain South African Tax Considerations—Securities Transfer Tax"* above, securities transfer tax will not be a creditable tax for US foreign tax credit purposes.

Medicare Tax on Unearned Income

US holders that are individuals, estates, or trusts and whose income exceed certain thresholds will be required to pay an additional 3.8% tax on "net investment income," including, among other things, dividends on and capital gains from the sale or other disposition of ordinary shares. US holders that are individuals, estates, or trusts should consult their tax advisors regarding the effect, if any, of this tax on their ownership and disposition of our ordinary shares.

Non-US Holders

If you are a non-US holder of the ordinary shares, you generally will not be subject to US federal income or withholding tax on dividends received on such ordinary shares, unless such income is effectively connected with your conduct of a trade or business in the United States, and the dividends are attributable to a permanent establishment (or in the case of an individual, a fixed place of business) that you maintain in the United States, if that is required by an applicable income tax treaty as a condition for subjecting you to US federal income taxation on a net income basis. In such cases, you generally will be taxed in the same manner as a US holder and will not be subject to US federal income tax withholding. If you are a corporate non-US holder, "effectively connected" dividends may, under certain circumstances, be subject to an additional "branch profits tax" at a 30% rate or a lower rate if you are eligible for the benefits of an applicable income tax treaty that provides for a lower rate.

If you are a non-US holder of the ordinary shares, you will also generally not be subject to US federal income or withholding tax in respect of gain realized on the sale of such ordinary shares, unless: (i) such gain is effectively connected with your conduct of a trade or business in the United States, and the gain is attributable to a permanent establishment (or in the case of an individual, a fixed place of business) that you maintain in the United States, if that is required by an applicable income tax treaty as a condition for subjecting you to US federal income taxation on a net income basis or (ii) in the case of gain realized by an individual non-US holder, you are present in the United States for 183 days or more in the taxable year of the sale or other disposition and certain other conditions are met. In the first case, the non-US holder will be taxed in the same manner as a US holder. In the second case, the non-US holder will be subject to US federal income tax at a rate of 30% on the amount by which such non-US holder's US-source capital gains exceed such non-US holder's US-source capital losses. If you are a corporate non-US holder, "effectively connected" gains may, under certain circumstances, be subject to an additional "branch profits tax" at a 30% rate or a lower rate if you are eligible for the benefits of an applicable income tax treaty that provides for a lower rate.

Passive Foreign Investment Company Rules

We believe that our ordinary shares will not be treated as stock of a PFIC for US federal income tax purposes for the current tax year. The determination of whether or not we are a PFIC is a factual determination that cannot be made until the close of the applicable tax year and that is based on the types of income we earn and the value of our assets (including goodwill), both of which are subject to change. In calculating goodwill for this purpose, we will value our total assets based on the total market value, determined with reference to the then-market price of the ordinary shares, and will make determinations regarding the amount of this value allocable to goodwill. Because the determination of goodwill will be based on the market price of the ordinary shares, it is subject to change. It is possible that the US Internal Revenue Service may challenge our valuation of our assets (including goodwill), which may result in us being classified as a PFIC. Thus, it is possible that we may be or become a PFIC in the current or any future taxable year, and we cannot assure you that we will not be considered a PFIC in any such tax year.

In general, if you are a US holder, we will be a PFIC with respect to you if for any taxable year in which you held the ordinary shares:

- at least 75% of our gross income for the taxable year is passive income; or
- at least 50% of the value, determined on the basis of a quarterly average, of our assets is attributable to assets that produce or are held for the production of passive income.

Passive income generally includes dividends, interest, royalties, rents (other than certain rents and royalties derived in the active conduct of a trade or business), the excess of gains over losses from certain types of transactions in commodities, annuities, and gains from assets that produce passive income. If a foreign corporation owns at least 25% by value of the stock of another corporation, the foreign corporation is treated for purposes of the PFIC tests as owning its proportionate share of the assets of the other corporation and as receiving directly its proportionate share of the other corporation's income.

If we are treated as a PFIC, and you are a US holder that did not make a mark-to-market election, as described below, you will be subject to special rules with respect to:

- any gain you realize on the sale or other disposition of your ordinary shares; and
- any excess distribution that we make to you (generally, any distributions to you during a single taxable year that are greater than 125% of the average annual distributions received by you in respect of the ordinary shares during the three preceding taxable years or, if shorter, your holding period for the ordinary shares).

Under these rules:

- the gain or excess distribution will be allocated ratably over your holding period for the ordinary shares;
- the amount allocated to the taxable year in which you realized the gain or received the excess distribution will be taxed as ordinary income;
- the amount allocated to each prior year, with certain exceptions, will be taxed at the highest tax rate applicable to you in effect for that year; and
- the interest charge generally applicable to underpayments of tax will be imposed in respect of the tax attributable to each such year.

Special rules apply for calculating the amount of the foreign tax credit with respect to excess distributions by a PFIC.

If you own shares in a PFIC that are treated as marketable stock, you may make a mark-to-market election. If you make this election in a timely fashion, you generally will not be subject to the PFIC rules described above in respect to your ordinary shares. Instead, in general, you will include as ordinary income each year the excess, if any, of the fair market value of your ordinary shares at the end of your taxable year over your adjusted basis in your ordinary shares. You will also be allowed to take an ordinary loss in respect of the excess, if any, of the adjusted basis of your ordinary shares over the fair market value at the end of your taxable year (but only to the extent of the net amount of previously included income as a result of the mark-to-market election). Your basis in the ordinary shares will be adjusted to reflect any such income or loss amounts, and any further gain on a sale or other disposition of the ordinary shares will be treated as ordinary income.

We do not intend to furnish you with the information that you would need in order to make a "qualified electing fund" election to include your share of our income on a current basis.

If you own ordinary shares during any year that we are a PFIC, you must file US Internal Revenue Service Form 8621 (whether or not a mark-to-market election is made) that describes the distribution received on the ordinary shares and the gain realized on the disposition of the ordinary shares. The reduced tax rate for dividend income, discussed above in "Taxation of Distributions Paid on Ordinary Shares," is not applicable to dividends paid by a PFIC.

The rules dealing with PFICs and the mark-to-market election are very complex and affected by various factors in addition to those described above. Accordingly, you should consult your own tax advisor concerning the application of the PFIC rules to your ordinary shares under your particular circumstances.

US Information Reporting and Backup Withholding Rules

Payments of dividends and sales proceeds that are made within the United States or through certain US-related financial intermediaries are subject to information reporting and may be subject to backup withholding, currently at a rate of 28%, unless the holder: (i) is a corporation or other exempt recipient or (ii) provides a taxpayer identification number and certifies that no loss of exemption from backup withholding has occurred. Backup withholding is not an additional tax, and the amount of any backup withholding from a payment will be allowed as a credit against the US holder's or the non-US holder's US federal income tax liability provided that the appropriate returns are filed. A non-US holder generally may eliminate the requirement for information reporting and backup withholding by providing certification of its foreign status to the payor, under penalties of perjury, on Internal Revenue Service Forms W-8BEN or W-8BEN-E, as applicable.

Information with Respect to Foreign Financial Assets

US holders of "specified foreign financial assets" with an aggregate value in excess of US$50,000 (and in some circumstances, a higher threshold) are generally required to file an information report with respect to such assets with their tax returns. "Specified foreign financial assets" may include financial accounts maintained by foreign financial institutions, as well as the following, but only if they are not held in accounts maintained by financial institutions: (i) stocks and securities issued by non-United States persons, (ii) financial instruments and contracts held for investment that have non-United States issuers or counterparties and (iii) interests in foreign entities. Holders are urged to consult their tax advisors regarding the application of this reporting requirement to their ownership of the ordinary shares.

THE PRECEDING DISCUSSION OF CERTAIN UNITED STATES FEDERAL INCOME TAX CONSEQUENCES IS INTENDED FOR GENERAL INFORMATION ONLY AND DOES NOT CONSTITUTE TAX ADVICE. ACCORDINGLY, EACH INVESTOR SHOULD CONSULT ITS OWN TAX ADVISOR AS TO PARTICULAR TAX CONSEQUENCES TO IT OF PURCHASING, HOLDING, AND DISPOSING OF THE ORDINARY SHARES, INCLUDING THE APPLICABILITY AND EFFECT OF ANY STATE, LOCAL, OR FOREIGN LAWS, AND PROPOSED CHANGES IN APPLICABLE LAWS.

F. DIVIDENDS AND PAYING AGENTS

Not applicable.

G. STATEMENTS BY EXPERTS

Not applicable.

H. DOCUMENTS ON DISPLAY

Our current Memorandum of Incorporation may be examined at our principal place of business at: Randfontein Office Park, Corner of Main Reef Road and Ward Avenue, Randfontein, 1759, South Africa.

We also file annual and furnish interim reports and other information with the SEC. You may read and copy any reports or other information on file at the SEC's public reference room at the following location:

Public Reference Room

100 F Street, NW

Room 1580

Washington D.C. 20549

Please call the SEC at 1-800-SEC-0330 for further information on the public reference rooms. The SEC filings are also available to the public from commercial document retrieval services. We file electronically with the SEC, and the documents it files are available on the website maintained by the SEC at www.sec.gov.

This Annual Report on Form 20-F reports information primarily regarding Harmony's business, operations and financial information relating to the fiscal year ended June 30, 2016. For more recent updates regarding Harmony, you may inspect any reports, statements or other information that Harmony files with the SEC.

No material on the Harmony website forms any part of this Annual Report on Form 20-F.

I. SUBSIDIARY INFORMATION

Not applicable.

ITEM 11 QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK

The information set forth under the heading *"Cautionary statement about forward-looking statements"* on the inside front cover is incorporated herein by reference.

General

We are exposed to market risks, including credit risk, foreign currency risk, commodity price risk and interest rate risk associated with underlying assets, liabilities and anticipated transactions. Following periodic evaluation of these exposures, we may enter into derivative financial instruments to manage these exposures. We have policies in areas such as counterparty exposure and hedging practices, which have been approved by our audit committee. We do not hold or issue derivative financial instruments for trading or speculative purposes.

We did not apply hedge accounting to incidental hedges held in the past.

In accordance with IAS 39 — Financial Instruments: Recognition and Measurement, we account for our derivative financial instruments as hedging transactions if the following criteria are met:

- in the case of a hedge of an anticipated future transaction, there is a high probability that the transaction will occur,
- and in the case of a cash flow hedge, the hedging instrument is expected to be highly effective.

Foreign Currency Sensitivity

In the ordinary course of business, we enter into transactions denominated in foreign currencies (primarily US dollars, Australian dollars and Kina). In addition, we incur investments and liabilities in US dollars, Australian dollars and PNG Kina from time to time. As a result, we are subject to transaction and translation exposure from fluctuations in foreign currency exchange rates. We do not generally hedge our exposure to foreign currency exchange rates.

In fiscal 2016 however, Harmony entered into foreign exchange hedging contracts in the form of zero cost collars, which establish a minimum (floor) and maximum (cap) Rand/US dollar exchange rate at which to convert the US dollars we receive on our gold sales to Rand. At June 30, 2016, the nominal amount of the hedging contracts is US$500 million and is spread over a 12 month period with a weighted average cap price of US$1=R18.27 and weighted average floor price of US$1=R15.55.

Our revenues and costs are very sensitive to the exchange rate of the Rand and other non-US currencies to the US dollar because gold is generally sold throughout the world in US dollars, but most of our operating costs are incurred in Rand and other non-US currencies. Appreciation of the Rand and other non-US currencies against the US dollar increases working costs at our operations when those costs are translated into US dollars, which reduces operating margins and net income from our operations. Depreciation of the Rand and other non-US currencies against the US dollar reduces these costs when they are translated into US dollars, which increases operating margins and net income from our operations. See Item 3: *"Key Information—Exchange Rates"* and *"Key Information—Risk Factors—Foreign exchange fluctuations could have a material adverse effect on Harmony's operational results and financial condition"*.

We did not have any currency contracts in place as of June 30, 2015 and 2014.

Commodity Price Sensitivity

General

The market price of gold has a significant effect on our results of operations, our ability to pay dividends and undertake capital expenditures, and the market prices of our ordinary shares.

Gold prices have historically fluctuated widely and are affected by numerous industry factors over which we do not have any control. See Item 3: *"Key Information—Risk Factors—The profitability of our operations, and cash flows generated by those operations, are affected by changes in the price of gold. A fall in the gold price below our cash cost of production for any sustained period may lead to losses and require Harmony to curtail or suspend certain operations"*. The aggregate effect of these factors, all of which are beyond our control, is impossible for us to predict.

Harmony's Hedging Policy

As a general rule, we sell our gold production at market prices. We generally do not enter into forward sales, commodity, derivatives or hedging arrangements to establish a price in advance for the sale of our future gold production.

However, subsequent to June 30, 2016, Harmony entered into short term gold forward sale contracts for a total of 432,000 ounces over a period of 24 months. These contracts manage variability of cash flows for approximately 20% of the Group's total production and were concluded at an average gold price of R682,000/kg. Harmony will apply cash flow hedge accounting to these contracts as we believe they are effective hedges.

Commodity Sales Agreements

We did not have any forward commodity sales agreements in place during fiscal 2016, 2015 or 2014.

Interest Rate Sensitivity

Our interest rate risk arises mainly from long-term borrowings. We have variable interest rate borrowings. Variable rate borrowings expose us to cash flow interest rate risk. Interest rate risk arising from long-term borrowings is offset by cash, restricted cash and restricted investments held at variable rates.

Sensitivity analysis—borrowings

A change of 100 basis points in interest rates on borrowings at June 30, 2016, 2015 and 2014 would have increased/(decreased) profit or loss before tax by the amounts shown below. This analysis assumes that all other variables remain constant.

	June 30,		
	2016	2015	2014
	($ in millions)		
Increase in 100 basis points	(2)	(3)	(3)
Decrease in 100 basis points	2	3	3

Sensitivity analysis – financial assets

A change of 100 basis points in interest rates on financial assets at June 30, 2016, 2015 and 2014 would have increased/(decreased) profit or loss before tax by the amounts shown below. This analysis assumes that all other variables remain constant.

	June 30,		
	2016	2015	2014
	($ in millions)		
Increase in 100 basis points	2	3	3
Decrease in 100 basis points	(2)	(3)	(3)

For further information on sensitivities, see note 4 "*Financial Risk Management*" to our consolidated financial statements set forth beginning on page F-1.

ITEM 12. DESCRIPTION OF SECURITIES OTHER THAN EQUITY SECURITIES

A. DESCRIPTION OF DEBT SECURITIES

Not applicable.

B. DESCRIPTION OF WARRANTS AND RIGHTS

Not applicable.

C. DESCRIPTION OF OTHER SECURITIES

Not applicable.

D. AMERICAN DEPOSITARY SHARES

On October 7, 2011, Harmony appointed Deutsche Bank Trust Company Americas in place of The Bank of New York Mellon as its Depositary for the ADSs evidenced by ADRs. A copy of our form of amended and restated deposit agreement (the "**Deposit Agreement**") among the Depositary, owners and beneficial owners of ADRs and Harmony was filed with the SEC as an exhibit to our Form F-6 filed on September 30, 2009.

The Depositary collects fees for delivery and surrender of ADSs directly from investors depositing shares or surrendering ADSs for the purpose of withdrawal or from intermediaries acting for them. The Depositary collects fees for making distributions to investors by deducting those fees from the amounts distributed or by selling a portion of the distributable property to pay the fees.

The principal terms regarding fees and charges that an ADR holder might have to pay, as well as any fee and other payments made by the Depositary to us as part of the Deposit Agreement, are summarized below.

Fees and Expenses

Persons depositing shares or ADR holders must pay:	**For:**
$5.00 (or less) per 100 ADSs (or portion of 100 ADSs)	• The execution and delivery of ADRs • The surrender of ADRs
$.02 (or less) per ADS	• Any cash distribution to you
A fee equivalent to the fee that would be payable if securities distributed to you had been shares and the shares had been deposited for issuance of ADSs	• Distribution of securities distributed to holders of deposited securities which are distributed by the depositary to ADR holders
Registration or transfer fees	• Transfer and registration of equity shares on our share register to or from the name of the depositary or its agent when you deposit or withdraw shares
Expenses of the depositary	• Cable, telex and facsimile transmissions (when expressly provided in the Deposit Agreement) • Converting foreign currency
Taxes and other governmental charges the depositary or the custodian have to pay on any ADR or share underlying an ADR, for example, stock transfer taxes, stamp duty or withholding taxes	• As necessary
Any charges incurred by the depositary or its agents for servicing the deposited securities	• As necessary

In addition, ADR holders must pay any tax or other governmental charge payable by the Depositary or its custodian on any ADS or ADR, deposited security or distribution. If an ADR holder owes any tax or other governmental charge, the depositary may:

- refuse to effect any transfer of such ADRs or any withdrawal of ADSs;
- withhold any dividends or other distributions; or
- sell part or all of the ADSs evidenced by such ADR,

and may apply dividends or other distributions or the proceeds of any sale in payment of the outstanding tax or other governmental charge. The ADR holder remains liable for any shortfall.

Fees and payments made by the Depositary

The Depositary has agreed to reimburse Harmony for expenses Harmony incurs that are related to the maintenance expenses of our ADR facility. The Depositary has agreed to reimburse Harmony for its continuing annual stock exchange listing fees. The Depositary has also agreed to pay the standard out-of-pocket maintenance costs for the ADRs, which consist of the expenses of postage and envelopes for mailing annual and interim financial reports, printing and distributing dividend checks, electronic filing of US federal tax information, mailing required tax forms, stationery, postage, facsimile, and telephone calls. It has also agreed to reimburse Harmony annually for certain investor relationship programs or special investor relations promotional activities. The amount of reimbursement available to Harmony is not necessarily tied to the amount of fees the Depositary collects from investors.

During the fiscal year ended June 30, 2016, Harmony received net direct and indirect payments of approximately $0.725 million from the Depositary.

PART II

ITEM 13 DEFAULTS, DIVIDEND ARREARAGES AND DELINQUENCIES

Not applicable.

ITEM 14 MATERIAL MODIFICATIONS TO THE RIGHTS OF SECURITY HOLDERS AND USE OF PROCEEDS

Not applicable.

ITEM 15 CONTROLS AND PROCEDURES

A. DISCLOSURE CONTROLS AND PROCEDURES

As of June 30, 2016, our management, with the participation of our Chief Executive Officer ("**CEO**") and Chief Financial Officer ("**CFO**"), carried out an evaluation, pursuant to Rule 13a-15 promulgated under the Exchange Act of the effectiveness of our "disclosure controls and procedures". Based on the foregoing, our management, including the CEO and CFO, concluded that our disclosure controls and procedures were effective as of June 30, 2016.

B. MANAGEMENT'S ANNUAL REPORT ON INTERNAL CONTROL OVER FINANCIAL REPORTING

Our management is responsible for establishing and maintaining effective internal control over financial reporting and for the assessment of the effectiveness of internal control over financial reporting. Our internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles. Harmony's internal control over financial reporting includes those policies and procedures that (i) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the Company; (ii) provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with generally accepted accounting principles, and that receipts and expenditures of the Company are being made only in accordance with authorizations of management and directors of the Company; and (iii) provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use, or disposition of the Company's assets that could have a material effect on the financial statements.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness to future periods are subject to risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

Management conducted an evaluation of the effectiveness of its internal control over financial reporting based on the framework in "*Internal Control —Integrated Framework* (2013 Framework) issued by the Committee of Sponsoring Organizations of the Treadway Commission ("**COSO**"). Management has assessed the effectiveness of internal control over financial reporting, as of June 30, 2016, and has concluded that such internal control over financial reporting was effective based upon those criteria.

PricewaterhouseCoopers Inc., an independent registered public accounting firm, which has audited the consolidated financial statements included in this Annual Report, has issued an attestation report on the effectiveness of Harmony's internal control over financial reporting as of June 30, 2016.

C. ATTESTATION REPORT OF THE REGISTERED PUBLIC ACCOUNTING FIRM

See report of PricewaterhouseCoopers Inc., an independent registered public accounting firm, which is included on page F-2 of exhibit 99.1. The consolidated financial statements, together with the report of PricewaterhouseCoopers Inc., are incorporated by reference to exhibit 99.1 and shall be deemed filed as part of the Harmony 2016 Form 20-F.

D. CHANGES IN INTERNAL CONTROL OVER FINANCIAL REPORTING

There has been no change in Harmony's internal control over financial reporting that occurred during fiscal 2016 that has materially affected or is reasonably likely to materially affect, Harmony's internal control over financial reporting.

ITEM 16A. AUDIT COMMITTEE FINANCIAL EXPERT

Mr. John Wetton, independent non-executive chairman of the audit and risk committee, is regarded as being the Company's "audit committee financial expert" as defined by the rules of the SEC.

In addition, the audit committee members through their collective experience meet a majority of the definitions of the SEC for an "audit committee financial expert" in both the private and public sectors. The members have served as directors and officers of numerous public companies and have over the years developed a strong knowledge and understanding of IFRS, overseeing the preparation, audit and evaluation of financial statements. We believe that the combined knowledge, skills and experience of the Audit Committee, and their authority to engage outside experts as they deem appropriate to provide them with advice on matters related to their responsibilities, enable them, as a group and under the guidance of Mr. Wetton, to act effectively in the fulfillment of their tasks and responsibilities required under the Sarbanes-Oxley Act.

ITEM 16B. CODE OF ETHICS

The information set forth under the heading:

- "—Governing Harmony—Corporate governance—Code of conduct" on pages 131 and 132

of the Integrated Annual Report for the 20-F 2016 is incorporated herein by reference.

ITEM 16C. PRINCIPAL ACCOUNTANT FEES AND SERVICES

A. AUDIT FEES

The following sets forth the aggregate fees billed for each of the two past fiscal years for professional fees to our principal accountants for the audit of the annual financial statements or for services normally provided by the accountant in connection with statutory and regulatory filings or engagements for those fiscal years.

Fiscal year ended June 30, 2015	US$	1.652 million
Fiscal year ended June 30, 2016	US$	1.477 million

B. AUDIT-RELATED FEES

The following sets forth additional aggregate fees to those reported under "Audit Fees" in each of the last two fiscal years that were provided by the principal accountant that are reasonably related to the performance of the audit or review of the financial statements:

Fiscal year ended June 30, 2015	US$	0.001 million
Fiscal year ended June 30, 2016	US$	0.001million

Fees related to interim reviews.

C. TAX FEES

The following sets forth the aggregate fees billed in each of the last two fiscal years for professional services rendered by the principal accountant for tax compliance, tax advice and tax planning:

Fiscal year ended June 30, 2015	US$	0.088 million
Fiscal year ended June 30, 2016	US$	0.039 million

Services comprised advice on disclosure for completion of certain tax returns.

D. ALL OTHER FEES

The following sets forth the aggregate fees billed in each of the last two fiscal years for products and services provided by the principal accountant not described above, and relate primarily to sustainability assurance services:

Fiscal year ended June 30, 2015	US$	0.059 million
Fiscal year ended June 30, 2016	US$	0.073 million

E. AUDIT COMMITTEE PRE-APPROVAL POLICIES AND PROCEDURES

Our audit committee pre-approves our engagement of PricewaterhouseCoopers Inc. to render audit or non-audit services in terms of its non-audit services policy. All of the services described above were approved in terms of the Company's delegation of authority framework and the audit committee's policy on non-audit services.

ITEM 16D. EXEMPTIONS FROM THE LISTING STANDARDS FOR AUDIT COMMITTEES

Not applicable.

ITEM 16E. PURCHASE OF EQUITY SECURITIES BY THE ISSUER AND AFFILIATED PURCHASERS

None.

ITEM 16F. CHANGE IN REGISTRANT'S CERTIFYING ACCOUNTANT

Not applicable.

ITEM 16G. CORPORATE GOVERNANCE

Significant ways in which Harmony's corporate governance practices differ from practices followed by US domestic companies under the listing standards of the NYSE.

Foreign private issuers, such as Harmony, must briefly highlight any significant ways in which their corporate governance practices differ from those followed by US domestic companies subject to the listing standards of the NYSE. Set out below is a brief summary of the significant differences.

US domestic companies are required to have a nominating/corporate governance committee and all members of this committee must be non-executive directors. The JSE Listing Requirements also require the appointment of such a committee, and stipulate that all members of this committee must be nonexecutive directors, the majority of whom must be independent. Harmony has a Nomination Committee comprised of five non-executive board members. The lead independent non-executive director serves as chairman of the Nomination Committee. For US domestic companies, the chairperson of this committee is required to be the chairperson of the board of directors. The current chairman of our board of directors, Patrice Motsepe, is chairman of one of Harmony's largest shareholders, African Rainbow Minerals Limited, and is thus not independent. He is, however, in terms of South African governance practices, a member of the Nomination Committee. The lead independent non-executive director was re-appointed in August 2016.

US domestic companies are required to have a compensation committee composed entirely of independent directors. Harmony has appointed a Remuneration Committee, comprising six board members, all of whom are non-executive and five of whom are independent.

The non-executive directors of US domestic companies must meet at regularly scheduled executive sessions without management. Although the JSE Listing Requirements do not require such meetings, the board meets without executives after each board meeting. The board also has unrestricted access to all company information, records, documents and property. Directors may, if necessary, take independent professional advice at the Company's expense and non-executive directors have access to management and may meet separately with management, without the attendance of executive directors.

ITEM 16H. MINE SAFETY DISCLOSURE

Not applicable.

GLOSSARY OF MINING TERMS

The following explanations are not intended as technical definitions, but rather are intended to assist the general reader in understanding certain terms as used in this annual report.

Alluvial: the product of sedimentary processes in rivers, resulting in the deposition of alluvium (soil deposited by a river).

All-in sustaining costs: all-in sustaining costs include mine production costs, transport and refinery costs, applicable general and administrative costs, costs associated with movements in production inventories, ore stockpiles, as well as ongoing environmental rehabilitation costs as well as transfers for stripping activities and costs associated with royalties. Employee termination costs are included, however employee termination costs associated with major restructuring and shaft closures are excluded. The following costs are also included: LED expenditure for continuing operations, share-based payments for continuing operations, corporate costs, sustaining exploration costs and sustaining capital expenditure including OCD expenditure and rehabilitation accretion and amortization for continuing operations. Depreciation costs are excluded. All-in sustaining costs per ounce are attributable all-in sustaining costs divided by attributable ounces of gold sold.

Auriferous: a substance that contains gold (Au).

Beneficiation: the process of adding value to gold products by transforming gold bullion into fabricated gold products.

By-products: Any products emanating from the core process of producing gold, including silver and uranium in South Africa and copper, silver and molybdenum in Papua New Guinea.

Carbon in leach (CIL): Gold is leached from a slurry of gold ore with cyanide in agitated tanks and adsorbed on to carbon granules in the same circuit. Granules are separated from the slurry and treated to remove the gold.

Carbon In Pulp (CIP): Gold is leached conventionally from a slurry of gold ore with cyanide in agitated tanks. The leached slurry passes into the CIP circuit where carbon granules are mixed with the slurry and gold is absorbed onto the carbon. Granules are separated from the slurry and treated to remove gold.

Carbon In Solution (CIS): a process similar to CIP except that the gold, which has been leached by the cyanide into solution, is separated by the process of filtration (solid/liquid separation). The solution is then pumped through six stages where the solution comes into contact with the activated carbon granules.

Cash costs: total cash costs include site costs for all mining, processing and administration, reduced by contributions from by-products and include royalties and production taxes. Depreciation, rehabilitation, corporate administration, retrenchment, capital and exploration costs are excluded. Total cash costs per ounce are attributable total cash costs divided by attributable ounces of gold produced.

Conglomerate: a coarse-grained classic sedimentary rock, composed of rounded to sub-angular fragments larger than 2mm in diameter (granules, pebbles, cobbles, boulders) set in a fine-grained matrix of sand or silt, and commonly cemented by calcium carbonate, iron oxide, silica or hardened clay.

Cut-off grade: minimum grade at which a unit of ore will be mined to achieve the desired economic outcome.

Decline: an inclined underground access way.

Depletion: the decrease in quantity of ore in a deposit or property resulting from extraction or production.

Development: process of accessing an orebody through shafts or tunneling in underground mining.

Electro-winning: the process of removing gold from solution by the action of electric currents.

Elution: removal of the gold from the activated carbon before the zinc precipitation stage.

Exploration: activities associated with ascertaining the existence, location, extent or quality of mineralized material, including economic and technical evaluations of mineralized material.

Fabricated gold: gold on which work has been performed to turn it into a product, such as jewelry, which differs from a pure investment product, such as a gold bullion bar.

Footwall: the underlying side of a fault, orebody or stope.

Forward sale: the sale of a commodity for delivery at a specified future date and price.

Gold reserves: the gold contained within proved and probable reserves on the basis of recoverable material (reported as mill delivered tons and head grade).

Gold produced: refined gold derived from the mining process, measure in ounces or kilograms in saleable form.

Grade: quantity of gold contained in a unit weight of gold-bearing material, generally expressed in ounces per short ton of ore.

Greenfield: a potential mining site of unknown quality.

Head grade: the grade of the ore as delivered to the metallurgical plant.

Indicated mineral resource: 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 exploration, sampling and testing information using appropriate techniques from outcrops, trenches, pits, workings and drill holes. The locations are too widely or inappropriately spaced to confirm geological and/or grade continuity but close enough for continuity to be assumed.

Inferred mineral resource: 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 assumed but not verified geological and/or grade continuity. It is based on information gathered through appropriate techniques from outcrops, trenches, pits, workings and drill holes that may be limited or of uncertain quality and reliability.

Leaching: dissolution of gold from crushed or milled material, including reclaimed slime, prior to absorption on to activated carbon.

Level: the workings or tunnels of an underground mine that are on the same horizontal plane.

Measured mineral resource: 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 exploration, sampling and testing information using appropriate techniques from outcrops, trenches, pits, workings and drill holes. The locations are spaced closely enough to confirm geological and grade continuity.

Measures: conversion factors from metric units to US units are provided below.

Metric unit		**US equivalent**
1 tonne	= 1 t	= 1.10231 short tons
1 gram	= 1 g	= 0.03215 ounces
1 gram per tonne	= 1 g/t	= 0.02917 ounces per short ton
1 kilogram per tonne	= 1 kg/t	= 29.16642 ounces per short ton
1 kilometer	= 1 km	= 0.621371 miles
1 meter	= 1 m	= 3.28084 feet
1 centimeter	= 1 cm	= 0.3937 inches
1 millimeter	= 1 mm	= 0.03937 inches
1 hectare	= 1 ha	= 2.47105 acres

Metallurgical plant: a processing plant used to treat ore and extract the contained gold.

Mill delivered tons: a quantity, expressed in tons, of ore delivered to the metallurgical plant.

Milling/mill: the comminution of the ore, although the term has come to cover the broad range of machinery inside the treatment plant where the gold is separated from the ore.

Mineralization: the presence of a target mineral in a mass of host rock.

Mineralized material: a mineralized body that has been delineated by appropriately spaced drilling and/or underground sampling to support a sufficient tonnage and average grade of metals to warrant further exploration. Such a deposit does not qualify as a reserve until a comprehensive evaluation based upon unit cost, grade, recoveries, and other material factors conclude legal and economic feasibility.

Mineral reserves: that part of mineralized material which at the time of the reserve determination could be economically and legally extracted or produced. Mineral reserves are reported as general indicators of the life-of-mineralized materials. Changes in reserves generally reflect:

- development of additional reserves;
- depletion of existing reserves through production;
- actual mining experience; and
- price forecasts.

Grades of ore actually processed may be different from stated reserve grades because of geologic variation in different areas mined, mining dilution, losses in processing and other factors. Recovery rates vary with the metallurgical characteristics and grade of ore processed. Neither reserves nor projections of future operations should be interpreted as assurances of the economic life-of-mineralized material nor of the profitability of future operations.

Open-pit/Opencast/Open cut: mining in which the ore is extracted from a pit. The geometry of the pit may vary with the characteristics of the orebody.

Ore: a mixture of mineralized material from which at least one of the contained minerals can be mined and processed at an economic profit.

Ore grade: the average amount of gold contained in a ton of gold bearing ore expressed in ounces per ton.

Orebody: a well-defined mass of mineralized material of sufficient mineral content to make extraction economically viable.

Ounce: one Troy ounce, which equals 31.1035 grams.

Overburden: the soil and rock that must be removed in order to expose an ore deposit.

Overburden tons: tons that need to be removed to access an ore deposit.

Placer: a sedimentary deposit containing economic quantities of valuable minerals mainly formed in alluvial environments.

Precipitate: the solid product of chemical reaction by fluids such as the zinc precipitation referred to below.

Probable reserves: reserves for which quantity and grade and/or quality are computed from information similar to that used for proved reserves, but the sites for inspection, sampling, and measurement are farther apart or are otherwise less adequately spaced. The degree of assurance, although lower than that for proved reserves, is high enough to assume continuity between points of observation.

Prospect: an area of land with insufficient data available on the mineralization to determine if it is economically recoverable, but warranting further investigation.

Prospecting license: an area for which permission to explore has been granted.

Proved reserves: reserves for which: (a) quantity is computed from dimensions revealed in outcrops, trenches, workings or drill holes; grade and/or quality are computed from the results of detailed sampling; and (b) the sites for inspection, sampling and measurement are spaced so closely and the geologic character is so well defined that size, shape, depth and mineral content of reserves are well-established.

Pyrite: a brassy-colored mineral of iron sulphide (compound of iron and sulfur).

Quartz: a mineral compound of silicon and oxygen.

Recovery grade: the actual grade of ore realized after the mining and treatment process.

Reef: a gold-bearing sedimentary horizon, normally a conglomerate band, which may contain economic levels of gold.

Refining: the final stage of metal production in which final impurities are removed from the molten metal by introducing air and fluxes. The impurities are removed as gases or slag.

Rehabilitation: the process of restoring mined land to a condition approximating its original state.

Sampling: taking small pieces of rock at intervals along exposed mineralization for assay (to determine the mineral content).

Shaft: a shaft provides principal access to the underground workings for transporting personnel, equipment, supplies, ore and waste. A shaft is also used for ventilation and as an auxiliary exit. It is equipped with a surface hoist system that lowers and raises conveyances for men, materials and ore in the shaft. A shaft generally has more than one conveyancing compartment.

Slimes: the finer fraction of tailings discharged from a processing plant after the valuable minerals have been recovered.

Slurry: a fluid comprising fine solids suspended in a solution (generally water containing additives).

Smelting: thermal processing whereby molten metal is liberated from beneficiated mineral or concentrate with impurities separating as lighter slag.

Spot price: the current price of a metal for immediate delivery.

Stockpile: a store of unprocessed ore.

Stope: the underground excavation within the orebody where the main gold production takes place.

Stripping: the process of removing overburden to expose ore.

Sulphide: a mineral characterized by the linkages of sulfur with a metal or semi-metal, such as pyrite, FeS.

Syncline: a basin-shaped fold.

Tailings: finely ground rock from which valuable minerals have been extracted by milling.

Tailings dam (slimes dam): Dam facilities designed to store discarded tailings.

Ton: one ton is equal to 2,000 pounds (also known as a “short” ton).

Tonnage: quantities where the ton or tonne is an appropriate unit of measure. Typically used to measure reserves of gold-bearing material in situ or quantities of ore and waste material mined, transported or milled.

Tonne: one tonne is equal to 1,000 kilograms (also known as a “metric” ton).

Trend: the arrangement of a group of ore deposits or a geological feature or zone of similar grade occurring in a linear pattern.

Unconformity: the structural relationship between two groups of rock that are not in normal succession.

Waste: ore rock mined with an insufficient gold content to justify processing.

Waste rock: the non-mineralized rock and/or rock that generally cannot be mined economically that is hoisted to the surface for disposal on the surface normally close to the shaft on an allocated dump.

Yield: the actual grade of ore realized after the mining and treatment process.

Zinc precipitation: a chemical reaction using zinc dust that converts gold solution to a solid form for smelting into unrefined gold bars.

PART III

ITEM 17 FINANCIAL STATEMENTS

Not applicable.

ITEM 18 FINANCIAL STATEMENTS

The following consolidated financial statements, together with the report of PricewaterhouseCoopers Inc., are incorporated by reference to exhibit 99.1 and shall be deemed filed as part of the Harmony 2016 Form 20-F:

- Index to Financial Statements;
- Report of Independent Registered Public Accounting Firm; and
- Consolidated Financial Statements.

ITEM 19. EXHIBITS

1.1	Memorandum of Incorporation of Harmony (previously known as Memorandum and Articles of Association) (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2014, filed on October 23, 2014)
2.1	Notice to shareholders dated October 26, 2016 in respect of the annual general meeting to be held on November 25, 2016
2.2	Deposit Agreement among Harmony, Deutsche Bank Trust Company Limited, as Depositary, and owners and holders of American Depositary Receipts, dated as of October 7, 2011 (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2011, filed on October 24, 2011)
2.3	Form of ADR (included in Exhibit 2.2) (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2011, filed on October 24, 2011)
4.1	Harmony (2003) Share Option Scheme, as amended (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2005, filed on November 3, 2005)
4.2	Deed of Extinguishment of Royalty (Wafi-Golpu Project) dated February 16, 2009 (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2009, filed on October 26, 2009
4.3	Hidden Valley Joint Venture Agreement dated May 22, 2008 between Morobe Consolidated Goldfields Limited, Newcrest PNG 1 Limited and Hidden Valley Services Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2009, filed on October 26, 2009)
4.4	Master Co-operation Agreement dated on or about August 5, 2008 between Hidden Valley Services Limited, Wafi-Golpu Services Limited, Morobe Exploration Services Limited, Harmony Gold (PNG Services) Pty Limited and Newcrest Mining Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2009, filed on October 26, 2009)
4.13	Subscription, Sale and Shareholders' Agreement dated March 20, 2013 between Harmony Gold Mining Company Limited, Business Venture Investments No. 1692 Proprietary Limited, Histopath Proprietary Limited, Business Venture Investments No. 1677 Proprietary Limited, Business Venture Investments No. 1687 Proprietary Limited, Business Venture Investments No. 1688 Proprietary Limited and the Trustees for the time being of the Harmony Gold Community Trust (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)
4.14	First Addendum to the Subscription, Sale and Shareholders' Agreement dated May 28, 2013 between Harmony Gold Mining Company Limited, Business Venture Investments No. 1692 Proprietary Limited, Histopath Proprietary Limited, Business Venture Investments No. 1677 Proprietary Limited, Business Venture Investments No. 1687 Proprietary Limited, Business Venture Investments No. 1688 Proprietary Limited and the Trustees for the time being of the Harmony Gold Community Trust (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)
4.15	Second Addendum to the Subscription, Sale and Shareholders' Agreement dated July 10, 2013 between Harmony Gold Mining Company Limited, Business Venture Investments No. 1692 Proprietary Limited, Histopath Proprietary Limited, Business Venture Investments No. 1677 Proprietary Limited, Business Venture Investments No. 1687 Proprietary Limited, Business Venture Investments No. 1688 Proprietary Limited and the Trustees for the time being of the Harmony Gold Community Trust (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)
4.17	Contractor Agreement dated March 20, 2013 between Harmony Gold Mining Company Limited, Business Venture Investments No. 1692 Proprietary Limited and ARMGold/Harmony Freegold Joint Venture Company (Proprietary) Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)
4.18	Services Agreement dated March 20, 2013 between Harmony Gold Mining Company Limited and Business Venture Investments No. 1692 Proprietary Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.19 Sale of Property Agreement dated March 20, 2013 between ARMGold/Harmony Freegold Joint Venture Company (Proprietary) Limited and Business Venture Investments No. 1692 Proprietary Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.20 Agreement of Lease dated March 20, 2013 between ARMGold/Harmony Freegold Joint Venture Company (Proprietary) Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.21 Borrower Pledge and Cession Agreement dated March 20, 2013 between Business Venture Investments No. 1677 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.22 Borrower Pledge and Cession Agreement dated March 20, 2013 between Business Venture Investments No. 1687 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.23 Borrower Pledge and Cession Agreement dated March 20, 2013 between Business Venture Investments No. 1688 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.24 Borrower Pledge and Cession Agreement dated March 20, 2013 between Histopath Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.25 Cashflow Waterfall Agreement dated March 20, 2013 between Harmony Gold Mining Company Limited, Business Venture Investments No. 1692 Proprietary Limited, Histopath Proprietary Limited, Business Venture Investments No. 1677 Proprietary Limited, Business Venture Investments No. 1687 Proprietary Limited and Business Venture Investments No. 1688 Proprietary Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.26 Addendum to the Cashflow Waterfall Agreement dated May 28, 2013 between Harmony Gold Mining Company Limited, Business Venture Investments No. 1692 Proprietary Limited, Histopath Proprietary Limited, Business Venture Investments No. 1677 Proprietary Limited, Business Venture Investments No. 1687 Proprietary Limited and Business Venture Investments No. 1688 Proprietary Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.27 Term Loan Facility Agreement dated March 20, 2013 between Business Venture Investments No. 1677 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.28 Addendum to the Term Loan Facility Agreement dated May 23, 2013 between Business Venture Investments No. 1677 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.29 Waiver letter dated June 24, 2013 in respect of the Term Loan Facility Agreement dated March 20, 2013 between Business Venture Investments No. 1677 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.30 Extension letter dated May 10, 2013 in respect of the Term Loan Facility Agreement dated March 20, 2013 between Business Venture Investments No. 1677 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.31 Term Loan Facility Agreement dated March 20, 2013 between Business Venture Investments No. 1687 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.32 Addendum to the Term Loan Facility Agreement dated May 24, 2013 between Business Venture Investments No. 1687 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.33 Waiver letter dated June 24, 2013 in respect of the Term Loan Facility Agreement dated March 20, 2013 between Business Venture Investments No. 1687 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.34 Extension letter dated May 10, 2013 in respect of the Term Loan Facility Agreement dated March 20, 2013 between Business Venture Investments No. 1687 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.35 Term Loan Facility Agreement dated March 20, 2013 between Business Venture Investments No. 1688 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.36 Addendum to the Term Loan Facility Agreement dated May 24, 2013 between Business Venture Investments No. 1688 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.37 Waiver letter dated June 24, 2013 in respect of the Term Loan Facility Agreement dated March 20, 2013 between Business Venture Investments No. 1688 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.38 Extension letter dated May 10, 2013 in respect of the Term Loan Facility Agreement dated March 20, 2013 between Business Venture Investments No. 1688 Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.39 Term Loan Facility Agreement dated March 20, 2013 between Histopath Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)

4.40	Addendum to the Term Loan Facility Agreement dated May 24, 2013 between Histopath Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)
4.41	Waiver letter dated June 24, 2013 in respect of the Term Loan Facility Agreement dated March 20, 2013 between Histopath Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)
4.42	Extension letter dated May 10, 2013 in respect of the Term Loan Facility Agreement dated March 20, 2013 between Histopath Proprietary Limited and Harmony Gold Mining Company Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2013, filed on October 25, 2013)
4.49	Harmony 2006 Share Scheme (2015 Amended Version) (as approved by shareholders on November 23, 2015
4.51	First Addendum to the Exchange and Sale of Mining Right Portions Agreement dated April 16, 2014 between Armgold/Harmony Freegold Joint Venture Company Proprietary Limited and Sibanye Gold Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2014, filed on October 23, 2014)
4.52	Reinstatement and Second Addendum to the Exchange and Sale of Mining Right Portions Agreement dated May 6, 2014 between Armgold/Harmony Freegold Joint Venture Company Proprietary Limited and Sibanye Gold Limited (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2014, filed on October 23, 2014)
4.53	Amended Trust Deed of the Tlhakanelo Employee Share Trust between Harmony Gold Mining Company Limited and Riana Bisschoff, dated March 14, 2014 (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2014, filed on October 23, 2014)
4.54	Harmony 2006 Share Scheme (2016 Amended Version) – marked up version to be presented to the shareholders for approval at the annual general meeting to be held on November 25, 2016
4.55	Revolving credit facility agreement of up to USD250,000,000 dated December 22, 2014 for Harmony Gold Mining Company Limited arranged by ABSA Bank Limited and Nedbank Limited (acting through its Nedbank Capital Division) with Nedbank Limited (acting through its Nedbank Capital Division) acting as Facility Agent (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2015, filed on October 23, 2015)
4.56	Annexure A to Exhibit 4.55 - Transfer Certificate dated May 5, 2015 (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2015, filed on October 23, 2015)
4.57	Annexure B to Exhibit 4.55 - Accession Deed dated May 6, 2015 (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2015, filed on October 23, 2015)
4.58	Amendment and Restatement Agreement amongst Harmony Gold Mining Company Limited, the Original Guarantors listed in Schedule 1 hereto, Nedbank Limited (acting through its Nedbank Capital and Nedbank Corporate divisions) (as Arranger and Original Lender) and Nedbank Limited (acting through its Nedbank Capital division) (as Facility Agent), dated February 5, 2015 (incorporated by reference to Harmony's Annual Report on Form 20-F for the fiscal year ended June 30, 2015, filed on October 23, 2015)
4.59	Amendment and Restatement Agreement between Harmony Gold Mining Company Limited, the Original Guarantors listed in Part 1 of Schedule 1 hereto, the Additional Guarantors listed in Part 2 of Schedule 1 hereto, Absa Bank Limited (acting through its Corporate and Investment Banking division), Nedbank Limited (acting through its Corporate and Investment Banking division), Nedbank Limited (acting through its London branch), HSBC Bank Plc – Johannesburg Branch (registered as an external company in South Africa), JPMorgan Chase Bank, N.A., London Branch, JPMorgan Chase Bank, N.A., Caterpillar Financial Services Corporation and Nedbank Limited, dated June 30, 2016
4.62	Second Amendment and Restatement Agreement between Harmony Gold Mining Company Limited, the Original Guarantors listed in Part 1 of Schedule 1 hereto, the Additional Guarantors listed in Part 2 of Schedule 1 hereto and Nedbank Limited (acing through its Corporate and Investment Banking division), dated June 30, 2016

4.63	Loan Agreement between Harmony Gold Mining Company Limited and the Trustees for the time being of the ARM Broad-Based Economic Empowerment Trust, dated March 1, 2016
4.64	Intercreditor agreement between African Rainbow Minerals Limited and Harmony Gold Mining Company Limited, dated March 1, 2016
4.67	Second Amendment and Restatement Agreement amongst Nedbank Limited (acting through its Corporate and Investment Banking division) (as Original Lender, Arranger and Facility Agent), the Trustees for the time being of the ARM Broad-Based Economic Empowerment Trust (as Borrower), African Rainbow Minerals Limited (as Guarantor) and Harmony Gold Mining Company Limited (as Guarantor), dated March 1, 2016
4.68	Subordination Agreement between Nedbank Limited (acting through its Corporate and Investment Banking division), the Trustees for the time being of the ARM Broad-Based Economic Empowerment Trust, African Rainbow Minerals Limited and Harmony Gold Mining Company Limited, dated March 1, 2016
4.69	Share Purchase Agreement between Harmony Gold (PNG Services) Proprietary Limited and Harmony Gold Mining Company Limited and Newcrest International Proprietary Limited and Newcrest Mining Limited, dated September 18, 2016
8.1	Significant subsidiaries of Harmony Gold Mining Company Limited
†12.1	Certification of the principal executive officer required by Rule 13a-14(a) or Rule 15(d)-14(a), pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
†12.2	Certification of the principal financial officer required by Rule 13a-14(a) or Rule 15(d)-14(a), pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
†13.1	Certification of the principal executive officer, pursuant to Section 906 of the Sarbanes-Oxley Act of 2002
†13.2	Certification of the principal financial officer, pursuant to Section 906 of the Sarbanes-Oxley Act of 2002
††15.1	Integrated Annual Report for the 20-F 2016 dated October 26, 2016 (adjusted version)
99.1	Consolidated Financial Statements 2016 dated October 26, 2016

† This certification will not be deemed "filed" for purposes of Section 18 of the Exchange Act or otherwise subject to the liability of that section. Such certification will not be deemed to be incorporated by reference into any filing under the Securities Act of 1933, as amended (the "Securities Act"), or the Securities Exchange Act of 1934, as amended (the "Exchange Act"), except to the extent that the Registrant specifically incorporates it by reference.

†† Certain of the information included in Exhibit 15.1 is incorporated by reference into the Harmony 2016 Form 20-F, as specified elsewhere in this report, in accordance with Rule 12b-23(a) of the Exchange Act.

With the exception of the items so specified, the Integrated Annual Report for the 20-F 2016 is not deemed to be filed as part of Harmony 2016 Form 20-F.

SIGNATURES

Pursuant to the requirements of Section 12 of the Exchange Act, we hereby certify that we meet all of the requirements for filing on Form 20-F and that we have duly caused this annual report to be signed on our behalf by the undersigned, thereunto duly authorized.

HARMONY GOLD MINING COMPANY LIMITED

By: /s/ Peter Steenkamp

Peter Steenkamp

Chief Executive Officer

Date: October 26, 2016

Exhibit 15.1: Integrated Annual Report for the 20-F 2016 dated October 26, 2016

INTEGRATED ANNUAL REPORT FOR THE 20-F 2016

CONTENTS

ABOUT THIS REPORT

Our Integrated Annual Report 2016 tells the story of Harmony Gold Mining Company Limited (Harmony) for our 2016 financial year (FY16), from 1 July 2015 to 30 June 2016. Certain comparative historical information is presented where relevant and to provide insight into our future plans.

This report explains Harmony's performance in the past year in terms of our strategic objectives and business model, the impact of the external environment in which we operate, what we plan to do in the future and how we intend to achieve this. While we consider the primary audience of our integrated report to be the primary providers of financial capital – shareholders and investors – we understand that other stakeholders also have an interest in our company and address their interests and concerns where possible and appropriate.

This report covers all of Harmony's wholly-owned operations in South Africa as well as its joint venture and own exploration activities in Papua New Guinea. In addition, this report details the material environmental, socio-economic and governance aspects of our operations, and of Harmony as a whole. Discontinued operations have been excluded unless otherwise stated.

For the purposes of this report we define the short, medium and long term as follows:
Short term – six months to a year
Medium term – one year to three years
Long term – longer than three years

In addition to this report, Harmony produces an annual report prepared on a Form 20-F that is filed with the United States Securities and Exchange Commission, in compliance with the listing requirements of the New York Stock Exchange. Copies of this will be available from 26 October 2016, free of charge at www.sec.gov and on our website. In an effort to align the Form 20-F with the Integrated Annual Report, we have included relevant information from the Form 20-F in this report. Any additional information can be found on our website at www.harmony.co.za/investors. This Integrated Annual Report has been developed in line with the International Integrated Reporting Council Framework, the Global Reporting Initiative G4 guidelines and the King III Report on Governance for South Africa. The full Global Reporting Initiative index is available on our website at www.har.co.za.

In addition, our annual financial statements, including the summarised consolidated statements, were prepared in accordance with the International Financial Reporting Standards as issued by the International Accounting Standards Board, the recommendations of the International Financial Reporting Interpretations Committee (collectively the International Financial Reporting Standards), the SAICA Financial Reporting Guidelines as issued by the Accounting Practices Committee, Financial Pronouncements as issued by the Financial Reporting Standards Council, the South African Companies Act 71 of 2008, as amended (Companies Act) and the JSE Listings Requirements.

For ease of reference, Harmony's audited annual financial statements are available in a separate report, the Financial Report 2016. A separate document, the Report to Shareholders containing the notice of annual general meeting and summarised financial statements, is posted to shareholders. No restatements were made in the 2016 financial year.

Everything we do, from risk assessment and decision making to reporting, is informed by our values and our understanding of how various elements of the business fit together. We have applied this approach to this report as well – it is a fully integrated document that gives insight into both our financial and non-financial performance. A section entitled Mineral Resources and Reserves – Summary appears in this report with more comprehensive information available in the report entitled Mineral Resources and Mineral Reserves 2016. The resource and reserve statements were compiled in accordance with the South African Code for Reporting of Exploration Results, Mineral Reserves and Mineral Resources, the Australian Code for Reporting of Mineral Resources and Mineral Reserves, Industry Guide 7 of the United States' Securities and Exchange Commission and the JSE Listings Requirements. This information was gathered, reviewed and confirmed by the relevant competent persons.

At Harmony we acknowledge that our reports are made meaningful by ensuring that the information presented is accurate and appropriate. The key performance indicators presented here were assured by Sizwe Ntsaluba Gobodo. A copy of their assurance report is available in this Integrated Annual Report.

All of the reports making up our 2016 suite of reports, together with a Glossary of Terms, used in these reports, are available online at www.har.co.za.

FEEDBACK

As our reporting and the activities discussed can be improved through feedback, should you have any comments or suggestions on this report, send them to our investor relations team: HarmonyIR@harmony.co.za.

WHO WE ARE

Harmony, a gold mining and exploration company, conducts its activities in South Africa, one of the world's best-known gold mining regions, and in Papua New Guinea, one of the world's premier new gold-copper regions. Harmony, which has more than six decades of experience, was South Africa's third largest gold producer and the twelfth largest in the world in FY16. We are currently growing a significant gold-copper portfolio in Papua New Guinea.

At Harmony, we understand the significant impact our company has on the lives of people, on the communities that surround our mines, on the environment, and on the economic well-being of the countries in which we operate.

OUR OPERATIONS AND PROJECTS

In South Africa, our operations are focused on the world-renowned Witwatersrand Basin. In addition, we have an open pit mine on the Kraaipan Greenstone Belt. We operate nine underground mines, one open-pit mine and several surface operations.

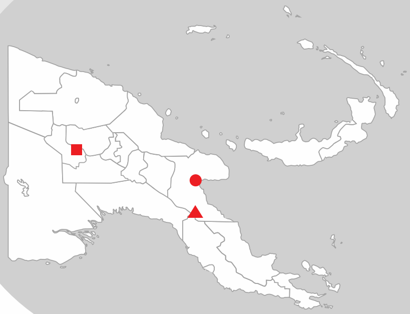
Our operation in Papua New Guinea is part of a 50:50 joint venture with Newcrest Mining Limited (Newcrest). This joint venture includes the Hidden Valley* open-pit gold and silver mine, the Golpu project in Morobe Province and significant exploration tenements. In addition to its joint ventures, Harmony also has a wholly-owned exploration portfolio that focuses on highly prospective areas in Papua New Guinea, including the Kili Teke gold-copper prospect.

In FY16, our South African operations accounted for 93% of total production of 1.08Moz, with the remaining 7% coming from Papua New Guinea. At the same time, our South African holdings represented 55% of our mineral resource base, while those in Papua New Guinea represented 45%. In terms of gold equivalent ounces, 62% of total mineral reserves are gold and 38% copper.

Harmony has been a very successful explorer in Papua New Guinea, by investing in and growing the Golpu project and by discovering the Kili Teke prospect. In developing a portfolio of world-class gold-copper assets in Papua New Guinea – replacing ounces at a discovery cost of less than US$10 per gold equivalent ounce – we are creating excellent long-term value for Harmony's shareholders.

** Post year-end, on 19 September 2016, we acquired full ownership of Hidden Valley, subject to the conditions precedent being met.*

WHERE WE OPERATE



SOUTH AFRICA

UNDERGROUND

FREE STATE OPERATIONS
- Tshepong
- Phakisa
- Bambanani
- Target 1
- Joel
- Masimong
- Unisel

WEST RAND OPERATIONS
- Doornkop
- Kusasalethu

OPEN PIT
- Kalgold

SURFACE
- Phoenix
- Dumps

HARMONY IN FY16

1.08Moz
GOLD PRODUCED

105.2Moz
MINERAL RESOURCES

36.9Moz
MINERAL RESERVES

30 547
PEOPLE EMPLOYED

R18.3 billion
REVENUE GENERATED

PAPUA NEW GUINEA

- Hidden Valley[1,2]
- Golpu project[1]
- Exploration[3]

[1] *As at 30 June 2016 held in a 50:50 joint venture through Morobe Mining Joint Ventures with Newcrest*

[2] *Harmony acquired full ownership post year-end*

[3] *Harmony 100% (Kili Teke) and within the joint venture*

OUR PEOPLE

Our company delivers long-term benefits to a broad range of stakeholders. We rely on experienced, skilled teams who live our values and play their role in maintaining stakeholder relationships, growing profits and maintaining a sustainable company.

At the end of FY16, Harmony employed 30 547 people in total – 25 861 employees and 4 580 contractors in South Africa and 76 employees and 30 contractors in Papua New Guinea (excluding employees of the Morobe Mining Joint Ventures). Our employees are drawn from communities around our operations, from other provinces in South Africa and Papua New Guinea, and from other countries (Lesotho, Mozambique, Zimbabwe and Australia). Our corporate offices are located in Randfontein, South Africa, close to some of our South African operations, while our south-east Asia office is in Brisbane, Queensland, Australia.

The company is governed by a board of directors which brings together a range of skills and experience and whose members are committed to maintaining the highest levels of corporate governance. In turn, the directors entrust the management of Harmony to skilled management teams which work towards ensuring that the company remains sustainable, towards improving margins and towards increasing the value of our assets.

OUR VALUES AND THEIR ROLE IN CREATING VALUE

As a company, Harmony understands that long-term value is about more than the commodities we produce and the profits we make. Our worth is also reflected in the impact we have on the lives of people, now and in the future.

Harmony lives its values – safety, being accountable, achievement and being connected and honest. These are the compass points for our actions, ensuring that, in addition to achieving our strategic goals, we seek to make the right decisions and support the members of our teams in doing so. They are ingrained in our training initiatives and decision-making processes, ensuring that they are at the front of employees' minds and actions, extending beyond our operations' gates. They guide our interactions with external stakeholders, from shareholders and the media to local communities, including those from which our employees are drawn. Our hope is that through our commitment, we can build a company with which people want to be associated and which will generate shared value into the future.

OUR SHAREHOLDERS

Harmony is listed on the Johannesburg Stock Exchange and on the New York Stock Exchange. The company's shares are quoted in the form of American Depositary Receipts on the New York Stock Exchange and as International Depositary Receipts on the Berlin Stock Exchange.

OUR AWARDS

In November 2015, Harmony's 2014 Integrated Annual Report received a merit award at the integrated reporting awards ceremony hosted by the Chartered Secretaries Southern Africa in partnership with the Johannesburg Stock Exchange.

Post year end, three of Harmony's operating units – the Asset Management Forum, Kusasalethu and Kalgold – received awards for second, third and fourth places respectively in the Best Improved Safety Performance category at the 2016 MineSAFE awards ceremony. Another three business units – Joel, Bambanani, and Kalgold – came second, third and fourth respectively in the Best Safety Performance category. In addition, our health hubs healthcare model was awarded third place in the Medical/Wellness category. Furthermore our Merriespruit housing development was named the best community residential unit project in the Free State. These awards all speak to our ongoing commitment to building a sustainable business and we are honoured to have been recognised. For the second consecutive year, the Carbon Disclosure Project has awarded Harmony a score of 100 for its climate change disclosure and ranked its climate change performance in Band A.

In addition, the Carbon Disclosure Project has also awarded Harmony a position on its Water A list in acknowledgment of the work being done in response to water issues and for sustainable water management. Harmony was one of only eight companies globally to achieve this award.

HOW WE CREATE VALUE

HARMONY'S PROCESS

LOCATE AND IDENTIFY EXPLORATION TARGETS
Obtain geological information

VALUATION STUDIES
Feasibility studies to determine economic viability of ore bodies

ESTABLISH INFRASTRUCTURE AND BUILD OR ACQUIRE MINES
Obtain financing and create infrastructure to access or acquire mineral resources

MINING OPERATIONS
Extraction of mineral reserves and ensuring safety of our people

MARKETING AND BENEFICIATION
Extracting the gold from the ore and refining

DIVESTMENT AND CLOSURE
Mine closure and land rehabilitation

WE INVESTED

PEOPLE EMPLOYED
30 547

RESERVES CONVERTED TO PRODUCTION
1.08Moz

PRODUCTION COSTS
R13 250m

CAPITAL EXPENDITURE AND EXPLORATION
R2 629m

POWER CONSUMED
2 597GWh

HARMONY

VALUE CREATED

R18 334m REVENUE

R964m HEADLINE EARNINGS

1.08Moz GOLD PRODUCED

R5 084m PRODUCTION PROFIT

50 SA cents a share DIVIDEND DECLARED

1.33Moz SILVER PRODUCED

Harmony creates value through more channels than just monetary spend. We continue to help improve education, build infrastructure, provide healthcare, stimulate local economies and rehabilitate the environment. Examples of this work can be found throughout this report.

SHARE OF VALUE CREATED DURING FY16 — VALUE DISTRIBUTED

WAGES AND SALARIES PAID (incl. contractors)	49%
TAXES AND ROYALTIES PAID, COMMUNITIES AND LOCAL ECONOMIC DEVELOPMENT	1.1%
CAPITAL EXPENDITURE AND EXPLORATION	16.5%
ELECTRICITY SPEND	13%
STORES AND SERVICES	20%
REHABILITATION	0.4%

CHAIRMAN'S LETTER

Dear shareholder

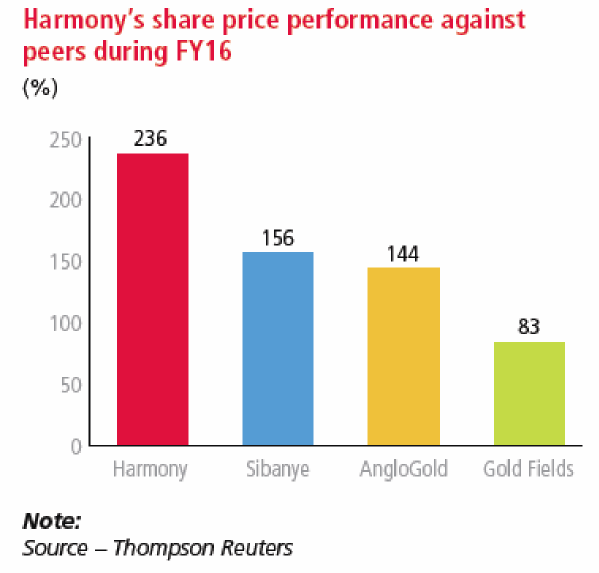
The year under review was a successful year.

Our share price increased from a low of R16 at the end of June 2015 to R52 at the end of June 2016. Harmony's share price outperformed all other gold mining companies locally and abroad. This increase was driven by the increase in the gold price, our return to profitability and the good work that our management is doing. The chief executive officer's review deals in greater detail with the operational performance of our mines.

Negative sentiment on gold was reversed by a surge in investors buying gold exchange traded funds. A record high of 568 tons of gold was bought through exchange traded funds in the first half of calendar 2016, with interest centred in North America and London[1]. The weakening of the exchange rate against the US dollar further contributed to the 21% increase in the rand gold price.

Good production results for the year combined with positive market conditions enabled us to increase our margins, significantly reduce debt, strengthen the balance sheet and declare our first dividend in three years of 50 SA cents per share.

[1] *Thomson Reuters GFMS Gold Survey 2016, quarter 2*



SAFETY

The safety and health of all our employees is our primary concern. We are committed to creating a culture where health and safety is our first priority.

There has been a substantial improvement in the lost-time injury frequency rate from 9.57 in the previous year to 6.50 per million hours worked in the current year.

Regrettably ten of our colleagues lost their lives in accidents during the financial year. We remain committed to zero fatalities at all our operations. I send my personal condolences and those of the entire Harmony to the families, friends and work colleagues of those who lost their lives at our operations.

The causes of all accidents are investigated and analysed thoroughly by our own safety personnel in conjunction with the authorities and employee representatives, and lessons learned are rigorously applied.

FINANCIAL RESULTS

This year we started reaping the benefits of our continued focus on cost management as well as the restructuring and optimisation initiatives implemented by management during the previous year. We achieved a unit cost increase of only 3% year-on-year and an 81% increase in production profit to R5.1 billion.

It is pleasing to see that our capital investments over the past few years have *inter alia* resulted in the improvement of the underground grade to an average of 5.02g/ton for this year. We look forward to this trend continuing into the future.

A higher average rand gold price received together with slightly higher gold production resulted in a net profit of R949 million for the year compared to a loss of R4.5 billion for the previous year. Headline earnings amounted to 221 SA cents per share compared to a headline loss of 189 SA cents during the previous year.

Further details on the company's operational performance are included in the Operational performance section of this report.

GROWTH STRATEGY

We continuously investigate opportunities to increase our production and reserves. Our acquisition of Newcrest's 50% share in Hidden Valley, in Papua New Guinea, is in line with our overall aspiration to increase our annual production profile to 1.5Moz within three years. We believe that Hidden Valley has the potential to contribute approximately 180 000oz of gold per annum to Harmony's production profile at an all-in sustaining cost of less than US$950/oz within the next three years.

Our exploration and development in Papua New Guinea has been successful since our first transaction in 2003. Following the declaration of a maiden resource at our wholly-owned Kili Teke prospect in November 2015, continued drilling proved to be increasingly promising and enabled us to declare an updated resource that has grown by 50% to 6Moz on a gold equivalent basis.

The Golpu gold-copper project in Papua New Guinea, is a world-class asset due to its size, high grades, long-life and low operating costs. We have completed and announced the project's stage 1 feasibility study outcomes as well as the prefeasibility study outcomes for stage 2. The design of the mine allows optionality and flexibility to scale the operation up with a relatively low capital investment. Golpu will create significant value for our shareholders in the long term.

LEVERAGING OF THE ENVIRONMENT FOR SOCIO-ECONOMIC UPLIFTMENT

Harmony is committed to making a lasting contribution to the economic and social development of all stakeholders in the countries where we operate.

Harmony's rehabilitation programme is creating jobs and contributing to building sustainable communities beyond the life of our mines by finding alternative uses of rehabilitated land for agriculture and renewable energy projects. This year we implemented the biogas project, establishing commercially viable vegetable and olive farms in Welkom and launched the Police and Prisons Civil Rights Union (POPCRU) training academy. We also released the Merriespruit 3 community rental units in partnership with the Department of Human Settlement and the Department of Mineral Resources.

I am confident that the South African government is committed to creating a globally competitive dispensation for investment in the mining industry. I uphold this view despite the outstanding issues between the government and the Chamber of Mines. We sometimes take longer than what is necessary to resolve our differences on various multi-stakeholder issues, whether it is the "once empowered always empowered principle" or other socio-economic issues. Our history and culture of multi-stakeholder engagement and seeking solutions which are in the interests of all stakeholders gives rise to my confidence that we will resolve these issues.

Papua New Guinea is also reviewing its current mining legislation with draft legislation tabled for discussion with all stakeholders.

GOLD MARKET

During the first six months of the reporting period, the gold price continued the downward trend that started in 2013, reaching lows of around US$1 060/oz, with sentiment remaining depressed. This was largely driven by the prospect of rising US interest rates as well as general negative commodity market sentiment.

In stark contrast, the second six months of the reporting period saw a dramatic change in sentiment, with the gold price rising by 25% to US$1 321/oz by the end of the financial year. Despite weak physical demand, especially from China and India, investment demand surged to push the gold price higher. The impact of Brexit added to uncertainty and provided further impetus to investment demand.

Worldwide mine gold production decreased during the first half of the 2016 calendar year, by 1% to 1 514 tons compared to the corresponding period in 2015. This points to a possible year-on-year decrease in mine production for the first time since 2008, as the long-term impacts of decreased capital and exploration spending begins to filter through. It is pleasing to see that the official sector remains a meaningful net buyer of gold, notably Russia and China[2].

[2] Thomson Reuters GFMS Gold Survey 2016, quarter 2

At Harmony we remain confident of the metal's long term fundamentals as a desirable and scarce store of wealth. However, periods of price volatility in our business can have a significant impact on our margin but can also present short term opportunities to secure an attractive margin. This is reflected by the steps taken by management to conclude a currency hedge for about 35% of our annual dollar flows in February 2016, and then concluding a gold production hedge just after the end of the current financial year for about 20% of two years' gold production.

THANKS

I would like to express my gratitude to all the directors, the management and all the employees of Harmony for their commitment, sacrifices and contributions to the development and growth of the company.

Peter Steenkamp has done an excellent job since being appointed as chief executive officer. I am confident that Harmony will continue to create value for our shareholders and also benefit our diverse range of stakeholders.

Patrice Motsepe
Chairman
26 October 2016

CHIEF EXECUTIVE OFFICER'S REVIEW

It is a pleasure to present my first annual report as chief executive officer of Harmony.

Harmony is driven by excellence, with strong management teams and mining capabilities. With the quality ore bodies that we own, we are positioned for a promising future. Operationally, Harmony has had a good year and we are in a much improved financial position. Harmony's share price performed exceptionally well over the past year, outperforming our peers and the gold price.

SAFETY AND HEALTH

In accordance with our values, our objective remains that our people are able to work without any harm to their safety or to their health.

Despite our combined best efforts, ten of our people lost their lives in the service of the company, nine in South Africa and one in Papua New Guinea. The colleagues no longer with us are: Piwas Kisa, Pheelo William Ramohlokoane, Ezekiel Nonkevu, Cancel Nurse Malungane, Carlos Sitoe, Moeketsi Mongoako, Motlatsi Samuel Lehana, Patuxolo Butshula and Mncedisi Mbongwa and Clinton Lewis Titmuss. I join my colleagues in offering our heartfelt condolences to the families, colleagues and friends of the deceased.

We have thoroughly investigated the causes of these fatal accidents. The lessons learned have resulted in revised procedures and the introduction of a central safety assurance team.

Harmony has intensified its focus on safety through the appointment of a chief operations officer who will refine the safety strategy to institutionalise risk management, promote a culture of continuous improvement and a genuine care for safety whilst providing safety leadership.

Our overall lost-time injury rate improved from 9.24 to 6.23 per million hours worked across the company from the previous year.

Harmony had been honoured with a number of awards at the 2016 MineSAFE awards ceremony which attests to our commitment to creating a safe and healthy workplace for our people. For more information, see Our Awards on page 7.

In terms of our holistic approach to ensure the wellness of our people, our health-care hubs are based at the operations and are staffed by medical professionals. These facilities provide prompt health services when they are required and redirect those in need of further attention to outsourced service providers. Our people are encouraged to be proactive in seeking treatment and advice.

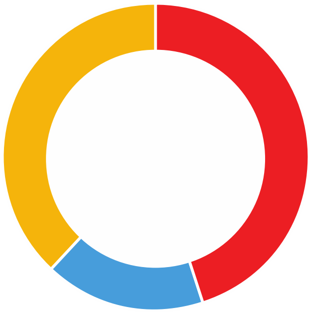
OPERATIONS

Total gold production for FY16 amounted to 1.08Moz, marginally higher than the previous year. An average increase of 21% in the rand gold price escalated group turnover to R18.3 billion (US$1.3 billion) (19% higher than the previous year in rand terms, US$84 million lower in US$ terms). Good cost control assisted us in limiting the increase in all-in sustaining costs to only 3% at R467 526/kg. The combined effect of this was an 81% increase in production profit to R5.1 billion (US$350 million).

Harmony increased the underground grade recovered for a fourth consecutive year to an average grade of 5.02g/t. This is due to the good results delivered by our projects. The ramp up in production at Phakisa and Tshepong decline is on track. We have managed to access higher grade areas through the deepening of Doornkop and Kusasalethu. In addition, we are successfully mining the Bambanani high-grade shaft pillar and the completion of the Joel decline is expected to deliver additional higher grade ore.

I am confident that we will achieve our production guidance of 1.05Moz at an all-in sustaining cost of US$1 100/oz (R495 000/kg) for FY17, having positioned each of our mines to produce safe, profitable ounces.

Gold equivalent reserves: geographic split
(%)



Total gold equivalent reserves: 36.9Moz	
South Africa (gold):	16.8Moz
Papua New Guinea (gold):	6.2Moz
Papua New Guinea (copper):	*13.9Moz
** Equivalent to 5 269Mlb copper*	

GROWING PROFITABILITY

Harmony's aspiration is to grow our production to approximately 1.5Moz and increase our profitability in the next three years by:

- growing, nurturing and developing our core assets
- harvesting operations that are high cost and have a short life
- expanding in South Africa, into Africa and in Papua New Guinea
- exploring organic growth opportunities

Papua New Guinea

Excellent progress is being made with the Golpu gold-copper project in which we have a 50% stake with Newcrest. During the year the feasibility and prefeasibility study of the project was completed, showing that the mine will operate in the lowest industry cost quartile, generating strong cash flows over many years. The Golpu gold-copper porphyry, a world-class deposit, lends itself to phased development and block cave mining and when completed, will be the largest underground mine in Papua New Guinea. The Golpu reserve was updated with the completion of the feasibility and prefeasibility study of Stage 1 and Stage 2 of the project. The updated reserve is declared as 379Mt containing 11.0Moz gold and 4.8Mt of copper (100% basis, 50% attributable to Harmony). Post year-end, an application for a special mining lease was submitted to the Mineral Resources Authority in Papua New Guinea.

We declared a maiden mineral resource in November 2015 at our wholly-owned Kili Teke project in Papua New Guinea. Subsequent exploration and drilling to further probe the potential to expand the two zones along strike and down dip generated encouraging results. This enabled us to update our initial estimate, post year end, to a 222Mt mineral resource at 0.35% copper and 0.25g/t gold (785 000t copper, 1.2Moz gold). The deposit contains two main areas of higher-grade quartz stockwork-related mineralisation.

Post year-end, Harmony acquired the whole of Hidden Valley, which was previously held in a 50:50 joint venture with Newcrest. The conclusion of this transaction is subject to South African regulatory approval.

Harmony plans to invest and develop stages 5 and 6 of the mine, accessing the ore body of 1.4Moz ounces of gold and 27Moz of silver over a period of seven years. We believe that Hidden Valley has the potential to contribute approximately 180 000oz gold per annum to Harmony's production profile at an all-in sustaining cost of less than US$950/oz within the next three years.

South Africa

We have resolved to optimise cash flow by accessing higher grades at Kusasalethu and shortening its life of mine. We are considering the feasibility of mining the high-grade Ventersdorp Contact Reef payshoot below our current infrastructure at Kusasalethu.

We are currently busy with an optimisation study to integrate the infrastructure between Phakisa and Tshepong with a view to improving the financial metrics of mining the combined operation.

Additional potential payable resources are expected to be defined with planned drilling of ore bodies scheduled at Tshepong, Phakisa, Doornkop, Target 1 and Kalgold.

SOUTH AFRICA'S LABOUR ENVIRONMENT

Harmony continued its open and co-operative interactions with employees and unions. In applying our value of connectedness, we ensure that employees feel part of the Harmony family. Since my appointment, I have used every opportunity to engage with our employees. A union leadership empowerment programme had been initiated in FY15 aimed at sharing the business imperatives and performance, company strategy and an understanding of business principles.

Labour disputes and strikes are considered a material issue for Harmony. Not only do these disputes result in a loss of production, but they also affect morale and reputation, and present a risk to non-striking employees, communities and company assets. We are fortunate that inter-union rivalry did not significantly affect Harmony in the past year.

We have reached a three-year wage agreement with the National Union of Mineworkers, United Association of South Africa and Solidarity, effective from 1 July 2015. Increases range from 6% for miners, artisans and officials to 10.4% for category 4 employees.

MINING CHARTER AND SOCIAL RESPONSIBILITY

Harmony supports South Africa's Broad-Based Socio-Economic Charter for the Mining Industry (the Charter) which is aimed at including historically disadvantaged persons and transforming the mining industry. Harmony is fully compliant with the current Charter's provisions and we have exceeded the 26% ownership credentials.

A draft new Mining Charter has been proposed by the Minister of Mineral Resources during May 2016. Harmony has partnered with the industry in seeking an open and negotiated agreement of the draft Charter's provisions to ensure that the rights of all our stakeholders are protected and advanced. Discussions are ongoing.

Harmony continues to comply with the current Charter's social requirements. Refer to the Mining Charter Compliance Scorecard.

CONCLUSION

I extend my appreciation to my chairman, Patrice Motsepe, for his support and leadership at the board. I also want to thank the board and my executive team for their guidance and support. I would also like to thank everyone at Harmony for making this company what it is and the support you have given me.

Our management teams are geared to deliver, steered by an experienced and competent executive team. I have no doubt that Harmony's current momentum will be upheld.

Peter Steenkamp
Chief executive officer
26 October 2016

SOCIAL AND ETHICS COMMITTEE: CHAIRMAN'S REPORT

Dear stakeholder,

It gives me immense pleasure as chairman of the social and ethics committee to present the committee's report for the year ended 30 June 2016. The committee is constituted in terms of the requirements of section 72(8) of the Companies Act 71 2008 (the Act), and its associated regulations. It is a sub-committee of the board and fulfils its functions on behalf of Harmony and its subsidiary companies with regard to social and economic development, environmental stewardship, governance and ethics, public safety, health, labour and employment matters. Operational safety is the responsibility of the technical committee. For more information on the composition of the social and ethics committee, refer to the Corporate Governance section of this report.

Despite market volatility in FY16, Harmony remained committed to the sustainable running of its business, in its commitment to delivering on its social and economic responsibilities and in making a lasting, positive impact on surrounding communities, our employees and other stakeholders.

APPROACH

Sustainability at Harmony is underpinned by our values system, which is intrinsic to our operating philosophy and practices. It remains key in our decision-making. We subscribe to the five capitals model (natural, human, social, manufactured and financial capital) which underpins our approach to sustainable investment. Our objective is to improve and advance each capital so that we create value during the lives of our mines and beyond by leaving a positive, lasting and felt legacy.

The social and ethics committee is confident that during the past financial year it complied fully with the legal, regulatory and other responsibilities assigned to it by the board.

ACTIONS IN FY16

The committee, which undertakes its duties with accountability both to the board and to the company's stakeholders, met five times during the past financial year and attended one site visit during the year. The committee's key activities are summarised in the Corporate Governance section of this report.

PUBLIC HEALTH AND SAFETY

The committee maintained responsibility for public safety during the past financial year and reviewed its strategic interventions, while reinforcing robust controls over access to our mines and the surrounding properties. Of particular concern are the repeated breaches of security perimeters, both by members of our communities and by criminals intent on illegal activities. I am saddened to report that three community members lost their lives in two separate incidents in Welkom as a result of trespassing on hazardous mine sites. Numerous community interventions were added to our existing programmes to further raise awareness of safety conditions and hazardous environments. Community interventions also focused on primary healthcare and HIV/AIDS awareness.

EMPOWERMENT AND TRANSFORMATION

Our moral obligation to our host communities extends beyond providing direct employment opportunities and financial benefits. We also drive social sustainability through local economic-development programmes as well as by local procurement.

Although the period for complying with the targets of the Mining Charter came to an end in December 2014, Harmony, in the spirit of transformation and going beyond compliance, continued to deliver in line with the tenets of the Charter, advancing in particular housing and living conditions, procurement and human resources. We measured ourselves against the 2014 targets and are pleased to confirm that we achieved and exceeded these targets during this financial year. (See the Mining Charter Compliance Scorecard in this report.)

When it comes to investing in and transforming our workforce, we have met and exceeded all the group-wide targets, with the appropriate number of historically disadvantaged South Africans employed at all levels of management. For more on this see, Employees and Communities section of this report.

Societal development remains an important objective and, with this in mind, as a group we invested R18 million (US$1 million) in local economic development. One notable legacy project implemented during the reporting period was the Merriespruit community rental unit which is directed at satisfying the demand for rental accommodation in Welkom. Construction of the Merriespruit 3 community rental units created employment for 300 members of the local community while building work was underway. Post year-end, this project was named the best community residential unit project in the Free State.

Recognising the role of small and medium enterprises in the community, Harmony launched the Phakamani Initiative which provides soft loans to entrepreneurs in Welkom. Although still in its infancy, the initiative has already made several meaningful investments, some of which supported the creation of 30 jobs.

In April 2016, the Minister of Mineral Resources released a draft Mining Charter for public comment. Harmony, through the Chamber of Mines, has been in extensive engagements with the Minister to develop the amended charter into a progressive document that will contribute to the further development of an enabling environment conducive to responsible mining and heightened transformation.

BUILDING A HEALTHY AND ENGAGED WORKFORCE

We believe that a healthy workforce coupled with a healthy workplace culture is integral to sustaining our productivity and profitability in today's business climate. Our culture gives priority to health and safety and, to this end, Harmony committed R100 million to a proactive healthcare strategy. In its third year of implementation in FY16, this initiative has already delivered a 14% reduction in absenteeism which translates to a thousand more people at work each day.

Consultation and collaboration form the cornerstones of our relationship with our employees, directly and through organised labour. It was against the strong fabric of mutual respect and trust that together we concluded a three-year wage agreement in October 2015. As the agreement was reached with unions which represented the majority of our employees, it was extended to include all employees. Following this agreement, we have experienced stable industrial relations across our operations. Refer to Operational Performance section of this report.

ENVIRONMENTAL MANAGEMENT

Looking back at the year under review, the committee is satisfied with Harmony's environmental performance. Managing our finite resources responsibly remained high on the agenda. With the water-scarcity challenges in South Africa, Harmony converted two of its operations to zero discharge by constructing two water treatment plants, thus maximising the re-use of mine water. Energy conservation was achieved by driving efficiencies, and innovative solutions which resulted in a 3% reduction in electricity consumption. Our performance in these areas was recognised with 'A' rankings in calendar year 2015 for the Carbon Disclosure Project's Climate Change and Water programmes.

Our land rehabilitation programme has advanced beyond demolition and restoration activities and has progressed to value creation. The bio-energy initiative is being commissioned, the solar parks are undergoing licensing and the agriculture and agro-processing programme has moved into implementation. All these projects are designed to deliver ecological benefits while supporting the socio-economic imperatives of job creation and entrepreneurial development.

ETHICS

We believe ethical conduct is a prerequisite for doing business. There is a direct correlation between sustainable business success and consistent ethical behaviour. The continued success of our company depends on the highest levels of integrity across all aspects of our business. We want all our stakeholders to view Harmony as a company they can trust – therefore we are unequivocal about our values and the way in which these values find expression in our daily behaviour. Our code of conduct was developed further and we introduced a behavioural code, which simplifies the detail set out in the code of conduct. For more on these codes, refer to Corporate Governance section of this report.

LOOKING FORWARD TO THE YEAR AHEAD

Although the first six months of the financial year were particularly challenging for the gold mining industry, Harmony has positioned itself to benefit from a higher gold price. Wider operating margins have strengthened our ability to meet our social commitments. Harmony is strengthening its engagement with host communities and with local authorities to ensure continuity and to manage expectations. It is vital that Harmony makes promises that it can keep in order to maintain and retain the relationships the company has worked to establish.

The licensing of Golpu in Papua New Guinea is of utmost importance to Harmony, and it is imperative that engagement and consultation are promoted between all key stakeholders to assist in obtaining the special mining lease permits.

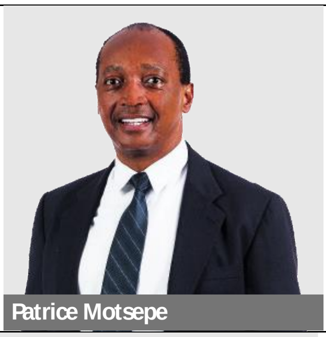
From a regulatory perspective, the Mineral and Petroleum Resources Development Act amendment bill and the Mining Charter in South Africa are under review and, in order to ensure that the legal reform results in sound implementable outcomes, Harmony is engaging closely with the authorities through the Chamber of Mines and other forums. Harmony has a strong footprint in South Africa and Papua New Guinea and remains committed to all our stakeholders and relevant host communities.

THANKS

We continue to make considerable progress on our journey towards sustainable development to deliver tangible benefits for all stakeholders. The commitment of our people to safety, health, governance and environmental performance is commendable and for that I thank you all. My sincere appreciation goes to members of the social and ethics committee and the board for their continued and invaluable guidance, support and input. Feel free to assist us in our further work by voicing your opinions and by providing feedback on our performance and disclosure.

Modise Motloba
Chairman: social and ethics committee
26 October 2016

BOARD OF DIRECTORS



Patrice Motsepe

CHAIRMAN

Patrice Motsepe (54)

BA (Legal), LLB

Appointed a director and non-executive chairman on 23 September 2003

In addition to being a non-independent non-executive chairman, Patrice is also a member of the nomination committee

Modise Motloba

INDEPENDENT NON-EXECUTIVE DEPUTY CHAIRMAN

Modise Motloba (50)

BSc, Diploma in Strategic Management

Appointed to the board on 30 July 2004

Chairman of the social and ethics committee and a member of the nomination committee and the audit and risk committee

Fikile De Buck

LEAD INDEPENDENT NON-EXECUTIVE DIRECTOR

Fikile De Buck (56)

BA (Economics), FCCA

Appointed to the board on 30 March 2006

Chairman of the nomination committee and a member of the social and ethics committee, the remuneration committee and the audit and risk committee

Peter Steenkamp

EXECUTIVE DIRECTORS

CHIEF EXECUTIVE OFFICER

Peter Steenkamp (57)

B Eng (Mining); Mine Managers Certificate Metal Mines; Mine Managers Certificate Fiery Mines; CPIR; MDP; BLDP

Appointed to the board on 1 January 2016, on appointment as chief executive officer

Frank Abbott

FINANCIAL DIRECTOR

Frank Abbott (61)

BCom, CA (SA), MBL

First appointed to the board as non-executive director on 1 October 1994, and was financial director from 1997 until 2004

Re-appointed financial director in February 2012

Mashego Mashego

EXECUTIVE DIRECTOR

Harry Ephraim "Mashego" Mashego (52)

BA (Education), BA (Hons), (Human Resources Management) Joint Management Development Programme, Global Executive Development Programme

Joined Harmony in 2005 and appointed an executive director on 24 February 2010

INDEPENDENT NON-EXECUTIVE DIRECTORS

Joaquim Chissano

Joaquim Chissano (77)

PhD

Appointed to the board on 20 April 2005

Member of the nomination committee and the social and ethics committee

Ken Dicks

Ken Dicks (77)

Mine Managers Certificate (Metalliferous Mines), Mine Managers Certificate (Fiery Coal Mines), Management diplomas (Unisa) and (INSEAD)

Appointed to the board on 13 February 2008

Member of the technical committee and the investment committee

Dr Simo Lushaba

Dr Simo Lushaba (50)

BSc (Hons), MBA , DBA , CD (SA)

Appointed to the board on 18 October 2002

Chairman of the investment committee and member of the audit and risk committee and the remuneration committee

Cathie Markus

Cathie Markus (59)

BA, LLB

Appointed to the board on 31 May 2007

Chairman of the remuneration committee and member of the investment committee and the social and ethics committee

Mavuso Msimang

Mavuso Msimang (75)

MBA (Project Management), BSc

Appointed to the board on 26 March 2011

Member of the nomination committee and the social and ethics committee. Successor to the lead independent non-executive director

Karabo Nondumo

Karabo Nondumo (38)
BAcc, HDip (Acc), CA (SA)

Appointed to the board on 3 May 2013

Member of the audit and risk committee, the technical committee and the investment committee

Vishnu Pillay

Vishnu Pillay (59)
BSc (Hon), MSc

Appointed to the board on 8 May 2013

Member of the technical committee, the investment committee and the remuneration committee

John Wetton

John Wetton (67)
CA (SA), FCA
Appointed to the board on 1 July 2011

Chairman of the audit and risk committee and member of the social and ethics committee, remuneration committee and investment committee

NON-EXECUTIVE DIRECTOR

André Wilkens

André Wilkens (67)

Mine Manager's Certificate of Competency, MDPA, RMIIA, Mini MBA Oil and Gas

Appointed to the board on 7 August 2007

Chairman of the technical committee and a member of the investment committee and the remuneration committee

Directors to be re-elected at the forthcoming annual general meeting:

In line with Harmony's memorandum of incorporation, the following directors are required to retire on a three-year rotational cycle and, being eligible, offer themselves for re-election at the forthcoming annual general meeting of shareholders:

Cathie Markus

Karabo Nondumo

Vishnu Pillay

André Wilkens

For further information and their detailed resumés, see our Report to Shareholders 2016 at www.har.co.za/16/download/HAR-RS16.pdf

EXECUTIVE MANAGEMENT

In addition to the three executive directors Peter Steenkamp, Frank Abbott and Mashego Mashego, who are on the board of directors, the following are members of our executive management.

EXECUTIVE: MINERAL RESOURCES AND EXPLORATION

Jaco Boshoff (47)

BSc (Hons), MSc, MBA, Pr Sci Nat, MSAIMM, MGSSA

Joined Harmony in 1996 and appointed to executive management in 2004

Has been Harmony's designated competent person for statutory reserves and resources reporting since 2004

EXECUTIVE: HUMAN RESOURCES

Anton Buthelezi (52)

National diploma (Human Resources Management), BTech (Labour Relations Management), Advanced Diploma in Labour Law, Certificate in Business Leadership

Rejoined Harmony in 2005 as human resources manager and appointed to executive management in 2011

Participates in the Chamber of Mines' gold sector caucus

EXECUTIVE: ENVIRONMENTAL MANAGEMENT

Melanie Naidoo-Vermaak (42)

BSc (Hons) (Industrial Microbiology), MSc (Sustainable Development), MBA

Joined Harmony in 2009 as a member of executive management

A member of the Chamber of Mines' environmental policy committee, the Far West Rand Dolomitic Water Association and Mining Industries Group

CHIEF OPERATING OFFICER: SAFETY, MINING PROJECTS, NEW DEVELOPMENT AND CORPORATE STRATEGY

Phillip Tobias (46)

BSc (Mining Engineering), Wits International Executive Development Programme and GIBS Advanced Management Programme, Professional Engineer (Pr Eng) and Mine Manager's Certificate of Competence

Joined Harmony as regional general manager on 1 July 2014 and was appointed to current position in executive management in March 2016

Appointed first black president of the Association of the Mine Managers of South Africa in 2008

Marian van der Walt

EXECUTIVE: CORPORATE AND INVESTOR RELATIONS

Marian van der Walt (43)

BCom (Law), LLB, Higher Diploma in Tax, Diplomas in Corporate Governance and Insolvency Law, Certificates in Business Leadership

Joined Harmony in 2003 as company secretary

Joined executive management as Executive: Legal in 2005

Appointed to current position in 2008

Non-executive director of Rand Refinery (Pty) Ltd

Johannes van Heerden

CHIEF EXECUTIVE OFFICER: SOUTH-EAST ASIA

Johannes van Heerden (44)

BCompt (Hons), CA(SA)

Joined Harmony in 1998 and appointed chief executive officer of its south-east Asia operations in 2008

Abre van Vuuren

EXECUTIVE: RISK MANAGEMENT AND SERVICES IMPROVEMENT

Abré van Vuuren (56)

BCom, Development Programme in Labour Relations, Management Development Programme, Advanced Labour Law Programme, Board Leadership Programme

Joined Harmony in 1997 and held various positions in services and human resources

Appointed to executive management in 2001

Beyers Nel

CHIEF OPERATING OFFICER: SOUTH AFRICAN OPERATIONS

Beyers Nel (39)

BEng (Mining Engineering), MBA, Professional Engineer (Pr. Eng), Mine Manager's Certificate of Competency

Joined Harmony on the merger with African Rainbow Minerals Gold in 2003 and appointed to current position in executive management in March 2016.

Currently vice president of the Association of Mine Managers of South Africa

SENIOR MANAGEMENT WHO ATTEND EXECUTIVE COMMITTEE MEETINGS

Simphiwe Kubheka

REGIONAL GENERAL MANAGER: (TSHEPONG AND PHAKISA)

Simphiwe Kubheka (34)

BSc (Eng) Mining Engineering, MBA, Mine manager's certificate of competency

Joined Harmony as a general manager in January 2014 and appointed regional general manager in June 2016

Moses Motlhageng

REGIONAL GENERAL MANAGER: (DOORNKOP, KUSASALETHU, KALGOLD)

Moses Motlhageng (41)

B-Tech. (Mining), Mine Manager's Certificate of Competency, Professional Engineering Technician

Joined Harmony in 2011 as a general manager and appointed regional general manager in June 2016

James Mafura

REGIONAL GENERAL MANAGER: (MASIMONG, JOEL, UNISEL AND BAMBANANI)

James Mufara (42)

BSc (Hons) (Mining), MBA, Mine Manager's Certificate of Competency

Joined Harmony in 2011 as a general manager and appointed regional general manager in 2012

Riana Bisschoff

GROUP COMPANY SECRETARY AND HEAD OF LEGAL

Riana Bisschoff (39)

LLB, LLM

Joined Harmony in 2012 as group company secretary

Appointed head of legal in February 2016

Is a qualified attorney, notary and conveyancer

Full and detailed resumés of all members of Harmony's executive management are available at www.harmony.co.za/about-us/management

OUR STRATEGY

Our primary strategic objective remains to create sustained value by producing safe, profitable ounces and by improving our margins. Cash generated will be used to advance our business objectives which are to:

- reduce our debt
- pay dividends to shareholders
- fund the development of Golpu in Papua New Guinea and make cash-generative acquisitions

Maintaining and increasing our margins are essential to sustaining our business and meeting our strategic and business objectives. This strategy is supported by three pillars – operational excellence, cash certainty and efficient capital allocation.

In line with our strategic objective, our medium-term aim is to increase gold production to approximately 1.5Moz by FY19 by:

- growing, nurturing and developing our core assets
- harvesting operations that are high cost and have a short life
- expanding in South Africa and Papua New Guinea as well as further into Africa
- assessing organic growth opportunities

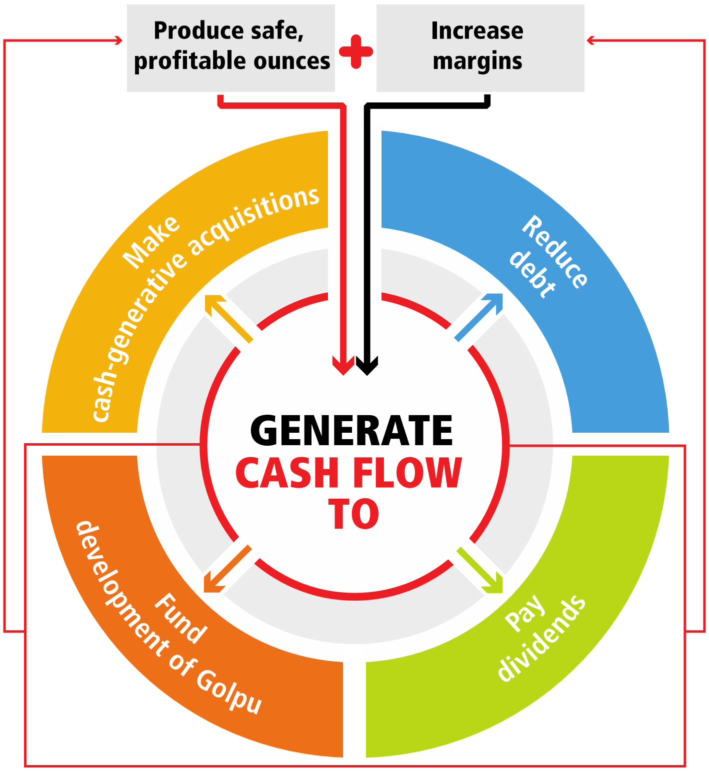
To this end, we remained focused on the safe mining of profitable ounces at all operations in FY16. As part of our planning for FY17, we have closed or placed on care and maintenance those sections of individual mines where costs and grades would render their exploitation unprofitable.

Through operational excellence and by adhering to our company values, applying mining discipline, further increasing our productivity, creating an enabling environment and applying grade cut-offs, we believe that our guidance for FY17 is realistic and achievable. These actions position our operations to produce safe, profitable ounces in future.

By mining profitably at all times we will ensure the financial strength and flexibility necessary to underpin our future sustainability and growth. This, in turn, is crucial to ensuring that we continue to serve all our stakeholders' best interests fairly.

Realistic planning supports our strategy to optimise assets – our ore bodies, our infrastructure and our people. This will ensure safer, more profitable production.

Our strategy



OUR BUSINESS CONTEXT

Relevant Global Reporting Initiative indicators: G4-EC5

At Harmony we understand that, as a business, we operate in a complex and ever-changing external environment – one that encompasses social, economic and environmental changes in the short, medium and long terms. At the same time, the business climate and context within our company are both dynamic and complex and, in many respects, are affected by the many changes in the external environment. We need to understand the external and internal environments as well as the relationships between the two to help us understand how we should position Harmony for success.

Identifying and understanding the factors that drive our internal and external business context require regular and consistent engagement with our stakeholders (see Material Issues and Stakeholder Engagement of this report).

This section should be read in conjunction with the section Managing our Risks and Opportunities.

UNDERSTANDING OUR EXTERNAL ENVIRONMENT

The mining environment in South Africa has been particularly challenging in recent years. Most notable has been the public debate on mining's contribution to society and, since 2012, the nature of the labour relations environment. The industry and its stakeholders have sought as far as possible to minimise the negative impacts.

We continue to have a positive view on the strength of the gold price, with cash certainty being key in times of extreme market volatility. The currency hedge programme introduced in February 2016 and the gold hedge programme entered into post year-end, were necessary short-term steps to secure margins and to create certainty for a portion of our future cash flows. This cash flow will enable us to further reduce our debt and strengthen our balance sheet.

Our external environment also influences the perceptions of shareholders towards investing in South Africa and Papua New Guinea, to investing in gold and, ultimately, to investing in Harmony. We have identified the various risks and opportunities that the company faces in the section Managing Risks and Opportunities.

The average rand gold price received increased to R544 984/kg in FY16, from R449 570/kg in FY15, as a result of a 27% weakening in the rand against the US dollar in FY16 to an average of R14.50/US$ (from R11.45/US$ in FY15). During FY16, the US dollar gold price received decreased by 4% to US$1 169/oz (US$1 222/oz in FY15).

Many analysts were bearish on gold at the start of the 2016 calendar year, expecting interest rates in the United States to rise, signalling further downside in the gold price. However, this did not happen and gold has outperformed as the global economy has been characterised by softer growth, leading many central banks globally to decrease rates this year. The ongoing discussion of negative interest rate policy by the European Central Bank and the Bank of Japan in particular has boosted demand for gold. In local currency terms – the rand and the Australian dollar – the gold price has risen to new highs prompting some producers to take advantage of this and to implement hedging contracts.

It remains the responsibility of all role players to create an industry that will attract investment. Although there are increasing expectations and demands by external parties – communities, local governments, non-governmental organisations and others – on the mining sector, we recognise that Harmony has an important role to play as a corporate citizen. Consequently, all relationships with our stakeholders are important – we engage and listen before agreeing on mutually beneficial actions. We have sponsored a number of youth development programmes, created job opportunities, built housing for local communities and provided bursaries, to name just a few of our community investment projects. In addition, a final dividend was paid to shareholders for FY16 – thus ensuring that all of our stakeholders share in the success that Harmony enjoyed during the past year. Our combined focus remains to fully reflect the value of our company in our share price.

An important external factor, in South Africa and Papua New Guinea, with the potential to have an impact on our company and our activities is that of legislative changes and amendments. In South Africa, our engagements with all levels of government are both direct and also indirect while at a national level this is also conducted through the Chamber of Mines of South Africa. We endeavour to maintain healthy relations with the regulators through regular, honest engagement and to provide input regarding pending legislation through the forums available such as the Chamber.

Sufficient, reliable supplies of water and electricity are essential to the safe, efficient conduct of our mining operations. Water is a scarce resource in South Africa, and supply was further constrained by the drought last summer. We have been implementing various measures to improve efficiency of use and have been proactively reducing water consumption by recycling (see Environmental Performance section of this report). In addition, we have provided potable water to water-stressed communities in both South Africa and Papua New Guinea.

In 2014, Harmony joined several of its peers in the gold mining sector in South Africa to establish the Gold Industry Working Group on Occupational Lung Disease to seek a sustainable, fair and comprehensive solution in dealing with this disease in the sector. Much work has been done in the past year to address the backlog in claims and ensure all eligible former employees receive the compensation they are entitled to timeously.

As an industry, we have taken steps to transfer all current and former miners from the Occupational Diseases in Mines and Works Act to the Compensation for Occupational Injuries and Diseases Act, which is better administered and has superior benefits. This is part of a broader initiative by government to review and unify South Africa's compensation systems. A legacy fund is to be established to enable 'top-up' payments to claimants, while safeguarding the industry against civil claims. Work on a legacy fund continues in the wider context of the silicosis class action which got underway in October 2015 and which is being defended by the members of the Working Group.

UNDERSTANDING OUR INTERNAL ENVIRONMENT

The most important aspects of our internal environment remain the safety and well-being of our employees, and the integrity and sustainability of our assets. Our internal environment is therefore shaped largely by factors which affect our employees or on which our employees have an impact. The environment and mining processes, combined with the behaviour of people, bring with them certain risks to our employees, which we aim to avoid, mitigate or manage. While we have seen significant improvements in our safety performance in recent years, we remain committed to further improvement, which is why keeping our employees safe and healthy is highlighted in our risks and is one of our material issues.

Occupational health risks are not the only health risks we work to mitigate – in South Africa our employees are at risk of contracting HIV/AIDS and tuberculosis, both of which are highly prevalent in our society, and we have put in place various initiatives to treat and prevent these illnesses. See the Safety and Health section of this report.

At Harmony we believe that our employees should be able to improve their lives through their work. As a result we offer extensive training and development programmes, including adult education and training, portable-skills training and on-the-job training. In addition, we invest in community education programmes to ensure that quality education is available at a young age and that promising students are given the tools to thrive, see the Employees and Communities section of this report.

We acknowledge the imbalance caused by historical systems in South Africa and work to remedy this through a recruitment policy that focuses on employing historically disadvantaged South Africans at all levels of the company, from the board through to entry-level employees. Harmony is committed to black economic empowerment in South Africa, through direct equity ownership, our procurement spend, management representation and through our employee share ownership scheme, which allows employees to share in the company's success. We have also put considerable time and effort into developing a successful women-in-mining project, which has seen many women find fulfilment in their underground roles. For further information on transformation, see the sections entitled Employees and Communities and Mining Charter Scorecard Compliance sections of this report.

By understanding what we need to do to help our employees feel safe and satisfied at work and by implementing various initiatives to achieve this and maintain open communication with them, we manage many of the factors that have an impact on our internal environment. Our emphasis on open communication also allows us to understand any emerging issues that may influence our efforts and gives us time to deal with them before they escalate.

The organisational restructuring implemented in the past year is aimed at improving internal efficiencies so as to ensure that we achieve our operational objectives and the mining of safe profitable ounces. Two chief operating officers have been appointed to support the chief executive officer – one to oversee operations and the other to oversee safety, organisational strategy and projects – and they in turn are supported by three regional general managers.

MANAGING OUR RISKS AND OPPORTUNITIES

WHY THIS IS MATERIAL TO HARMONY

In identifying and understanding the risks and opportunities facing our business, we are better able to mitigate and/or manage them and thereby position the company to take advantage of any opportunities, future challenges and growth prospects.

OUR APPROACH TO RISK MANAGEMENT

At Harmony, our approach to risk relies on the continual monitoring of risk and related mitigation procedures and when appropriate, their revision. Our risk management strategy strives to be practical and effective, rather than to focus solely on compliance. Risk management is embedded within our day-to-day activities and processes.

Our risk management process

The management of risk is guided by specific regulatory and legislative requirements, and is championed internally by our chief executive officer. While management is responsible for implementation and compliance, the audit and risk committee is responsible for oversight of the process, its adequacy and effectiveness. Reporting on risk-related performance is marked for the attention of the various board sub-committees.

Because relationships underpin everything we do, our risk management process is based on engagement – between management and the board, and between the company and various stakeholders – to ensure that we address risks appropriately.

Risk management has as its starting point the group's strategy. It is important to understand those factors that have the potential to hinder our ability to deliver on our strategy, as well as to identify those opportunities that will enable us to achieve our goals. We benchmark the risks and opportunities identified against those of our peers to ensure that the risks we identify are not only specific to Harmony but also include those facing the industry.

In preparing their formal reports to the board, the executive committee and the audit and risk committee meet quarterly to examine the risks and discuss any changes in their relative importance or in their mitigation. The audit and risk committee's review is supplemented by feedback from the various board sub-committees and reviews of specific risks falling within the ambit of their responsibilities.

Each quarterly examination is based on experiences at the operations, feedback from key stakeholders, external factors and management meetings. In addition, various teams within the company address risk on a regular basis as part of their day-to-day roles. This creates an ongoing conversation about risk at different levels, allowing any changes to be captured on a continuing basis.

While risk management is included in our day-to-day processes, formal weekly risk reviews are undertaken by management teams at the operations, to identify and prioritise specific high-risk issues at an operational level. These operational and safety risk reviews are reported to the respective regional general managers with additional oversight by the operations' committees.

Roles of the board and audit and risk committee

Risk is a standard item on the agenda at audit and risk committee meetings and the committee's role in our risk management process is multi-dimensional. The committee's primary task is to identify, prioritise, manage and monitor strategic enterprise risks at Harmony, while operational and safety specific risks are monitored by the technical committee of the board. Our risk management process reflects our integrated approach to business and the audit and risk committee – supported by various board sub-committees – examines all risks affecting our strategy.

To do this, the committee spends considerable time reviewing and evaluating the processes in place to identify, monitor and manage risk. These include our risk management policy, methodology and planning, formal risk assessment, internal controls and assurance processes, our risk appetite and tolerance and our responses to the risks identified. Once the audit and risk committee is satisfied with these, responsibility for their implementation devolves to executive management and their teams. In turn, their task is to ensure that these risk processes are constantly applied in day-to-day activities.

Based on these reviews, the audit and risk committee submits its findings to the board. The top strategic, operational and safety-specific risks and mitigating factors are reported to the board on a quarterly basis.

OUR ACTIONS IN FY16

During FY16, we formulated group-level risk appetite and tolerance levels, and continued to monitor our risks to identify and manage those that were most material to the company.

While our group-level risk appetite and tolerance levels are subject to formal annual reviews, these are continually monitored for relevance in terms of changing macro-environment factors. Our tolerance levels are further defined at lower tolerance limits per risk.

OUR RISKS AND OPPORTUNITIES

Various risk factors contain an element of volatility, for example, commodity prices and exchange rates, labour dynamics and the regulatory environment. As a result, our risk profile reflects industry dynamics and Harmony-specific issues and opportunities at a particular time.

The following two graphs and the table on the following pages show our top strategic risks and opportunities.

Our risk profile is based on potential events and/or factors that pose either a threat and/or an opportunity. These downside and upside risk factors are duly taken into account in our day-to-day business activities and, having been identified, are integral to the formulation and management of our group strategy.

Our group-level risk appetite statement

Harmony is in the business of gold mining in South Africa and Papua New Guinea, which is a high-risk, high-reward business. We are involved in the entire gold mining value chain – from exploring for prospects, conducting feasibility studies and building, buying and operating mines to closing and rehabilitating mines at the end of their lives.

In the course of conducting our business, we are exposed to the volatility of the gold price and exchange rates and where appropriate will mitigate some of this exposure through hedging programmes. We operate well in emerging economies and have the ability to deal with the socio-political dispensations in these countries.

Exploration remains one of the most effective ways to grow an ore body and to create value, and for this reason we continue to invest in exploration.

We have an appetite for change and continuous improvement and are constantly looking for innovative ways to improve our existing mines and acquire mines that we can improve on operationally.

Deep-level gold mining in South Africa is very labour intensive and we have the skills to deal with the challenges of multi-stakeholder labour relations. We continuously improve the health and safety of our employees.

We have experienced teams with strong values and we are committed to deliver.

For more detailed information pertaining to risk factors and their potential impact see the Form 20-F as filed with the United States' Securities Exchange Commission.

MATERIAL ISSUES AND STAKEHOLDER ENGAGEMENT

The process to determine our material issues derives from our risk management process and stakeholder engagement. Combined with the Global Reporting Initiative's materiality assessment, we conduct a gap analysis and benchmark against our peers to determine our key material indicators. We consider those indicators that are most closely related to our values and strategy. From this process, we have derived the following five material issues, which encompass most of our key risks and address our values, which are safety, accountable, achievement, connected and honesty.

OUR APPROACH TO STAKEHOLDER ENGAGEMENT

Our stakeholder engagement complies with relevant legislation and standards, including ISO 14001, OHSAS 18001 and ISO 9000. Using our stakeholder engagement policy and strategy we identify various stakeholders, internal and external, across our business process.

Given our many stakeholders, priority is given to those who are most likely to have the greatest impact on Harmony in terms of our achieving our strategic objectives and our business performance.

The primary aim of our stakeholder engagement is to share and gather information to inform our business decisions. This two-way communication is guided by our values and our strategic intent:

- To improve the lives of host communities/stakeholders through appropriate programmes or projects
- To find solutions to the various challenges facing our society and host communities, including unemployment and lack of economic activity, by collaborating with stakeholders and forming meaningful partnerships
- To find a balance between the expectations of shareholders and those of other stakeholders

Our engagement with stakeholders is inclusive, so that it is:

- Meaningful, and addresses what is material to stakeholders
- Complete, so that we understand the views, needs, perceptions and expectations linked to issues that stakeholders view as material
- Responsive, so that we respond to material issues timeously, coherently and appropriately

Stakeholder engagement is integral to our business and shapes our actions in determining strategy, addressing problems, and allocating resources. Effective stakeholder engagement helps us better manage risks, opportunities, and enhances the company's reputation, which is essential to the long-term sustainability of Harmony. Furthermore, effective, meaningful stakeholder engagement contributes to our store of knowledge as a company and provides information which leads to improved decision-making processes. The board's social and ethics committee oversees stakeholder relations, while the board itself monitors relations with stakeholders.

WHY THIS IS MATERIAL TO HARMONY

To be a profitable, responsible and sustainable business, mutually beneficial and sustainable relationships with various stakeholders are vital to the success of our business strategy, especially in relation to our material issues. Given that our material issues are informed by stakeholder engagement, it is important to understand and meet our stakeholders' needs and expectations where possible. We engage with numerous stakeholders – individuals and organisations – on an ongoing basis.

Continuous engagement with our stakeholders

MATERIAL ISSUES AND THEIR IMPACTS

1. Keeping our people safe and healthy

People are central to our business. While we have made significant progress in recent years in improving safety and health underground, safety remains a priority.

We continue our proactive people-centric approach, focusing on training and communication to entrench safe behaviour in the workplace. We understand the need to make additional safety advances by applying new technology and/or advancing protective equipment.

Our employees also face occupational health risks from working underground. We address all operational health risks and offer treatment for a variety of other health concerns. We believe that prevention is better than cure and offer proactive, integrated and holistic health strategy and programmes. Our aim is to ensure our employees return home safely and in good health. For more, see the Safety and Health section of this report.

Related key risks and/or opportunities: safety; potential liability for occupational health diseases; not achieving our operational objectives; labour disputes and unrest and inter-union rivalry; new technology

Our response

- Promoting engagement aimed at enhancing safety in the workplace and employee health
- Implementing proactive safety awareness campaigns aimed at improving safety performance
- Implementing healthcare programme – health hubs

See the Safety and Health section of this report

Stakeholders

- Employees and contractors
- Labour unions
- Regulators
- Shareholders
- Analysts

2. Achieving our business objectives

While success in achieving our business objectives drives what we do, we are not solely focused on short-term success. As explained in the section Our Strategy, our aim is to create a viable business for years to come. As a result, we also consider our future objectives, such as using technology and innovation, diversifying our resource base, and ensuring we have projects in place to sustain and grow our production.

Related key risks and/or opportunities: safety; reserve base depletion/growing for future ounces; not achieving our operational objectives; labour disputes and unrest and inter-union rivalry; socio-economic, political and regulatory changes; major infrastructure incidents; reliability of power supply and associated costs; strategic consideration of options for Hidden Valley; potential liability for occupational health diseases; gold price and foreign exchange fluctuations; productivity improvements; new technology

Our response

- Communicating progress made in achieving our objectives and on impacts of changes in the gold price and the rand/US dollar exchange rate
- Implementing initiatives to reduce and contain costs
- Engaging with suppliers to ensure cost increases are contained and reasonable
- Liaison with the Papua New Guinea government around Golpu, and application for the special mining lease and related approvals and permits

This is discussed throughout this report, and in particular, in the Chief Executive Officer's Review and Operational Performance sections of this report.

Stakeholders

- Shareholders, investors
- Providers of capital
- Analysts
- Media
- Employees and unions
- Business partners
- Suppliers

3. Maintaining stability in our workforce

Amid a potentially fractious industrial relations environment in the South African mining industry, we focus on having positive and open relationships with our employees and labour unions. By fostering conversation, we understand and are able to address grievances before industrial action. The benefits of a stable industrial relations climate are extensive. We want to create workplaces where employees feel safe, respected and valued. A stable workforce contributes to our aim of meeting our business objectives, as it results in lower employee turnover and stabilises production. The benefits of this are shared with employees through production bonuses, reward and recognition programmes and the employee share ownership scheme. For more on these, see Remuneration Report.

Related key risks and/or opportunities: safety; labour disputes and unrest, and inter-union rivalry; not achieving our operational objectives; major infrastructure incidents; productivity improvements; new technology

Our response

- Proactive, regular engagement based on openness, honesty and integrity
- Constructive engagement to facilitate understanding of issues and concerns of both sides
- Commitment to resolving the issues and addressing concerns

See the Employees and Communities section of this report

Stakeholders

- Employees and contractors
- Labour unions
- Chamber of Mines
- Shareholders, investors
- Analysts
- Media

4. Protecting our licence to operate

To be a successful company, we must earn and retain our right to mine. This requires a clear understanding of local legislation and regulations, as well as having solid relations with government, communities, industry bodies and local business partners. We seek more than compliance: we will transform our workforce, ensure good corporate governance, and be a responsible corporate citizen. For more on this, see Mining Charter Compliance Scorecard.

Related key risks and/or opportunities: safety; socio-economic, political and regulatory changes; major infrastructure incidents; potential liability for occupational health diseases

Our response

- Proactive engagement on the state of our business and potential restructuring and possible impacts of the latter
- Proactively engaging to promote alignment of expectations and to understand communities' needs to enable us to make a positive, sustainable contribution
- Communication on compliance targets achieved and challenges being encountered, particularly those relating to housing
- Engaged on proposed amendments to the Mining Charter and the Mineral and Petroleum Resources Development Act
- Participated in the Mining Phakisa, a collaborative engagement between government and the mining industry on the industry's future
- Engaged with suppliers to ensure that their processes are aligned with our human rights and environmental standards, code of conduct and empowerment requirements

See the Employees and Communities section of this report

Stakeholders

- Government and regulators (in particular the Parliamentary Portfolio Committee on Mineral Resources)
- Various government departments (national and regional)
- Communities and local municipalities
- Chamber of Mines
- Labour unions
- Media
- Suppliers

5. Managing our impacts

The resources available to our business are finite and we respect this. We are environmentally responsible through careful monitoring of our consumption, emissions and impact. Our commitment to improving health and safety speaks to our need to protect human resources, while our training and development programmes highlight how we encourage each employee to learn and grow their skills. Responsible resource management is also crucial to our socio-environmental rehabilitation planning. While our mines are operational, we want to do all we can to improve the living conditions of employees and communities, and to bolster both socio-economic and ecological developments, so that when our mines close we will leave behind us viable communities able to support their economies and which are not plagued by environmental or health issues. This entails planning now, ahead of mine closure, and is something we are constructively working towards. For more on our skills training and rehabilitation initiatives see the section, Employees and Communities of this report.

Related key risks and/or opportunities: safety; socio-economic, political and regulatory changes; major infrastructure incidents; strategic consideration of Hidden Valley options; potential liability for occupational health diseases; new technology

Our response

- Developing and implementing initiatives to empower local communities to ensure sustainable economic activity once mining has ceased
- Inclusive engagement relating to land rehabilitation in the Free State and the creation of sustainable of economic activities independent of mining

See the Safety and Health, Employees and Communities and Environmental Performance sections of this report

Stakeholders

- Provincial government and district and local municipalities
- Communities
- Local business partners
- Shareholders
- Media
- Employees and unions

SAFETY AND HEALTH

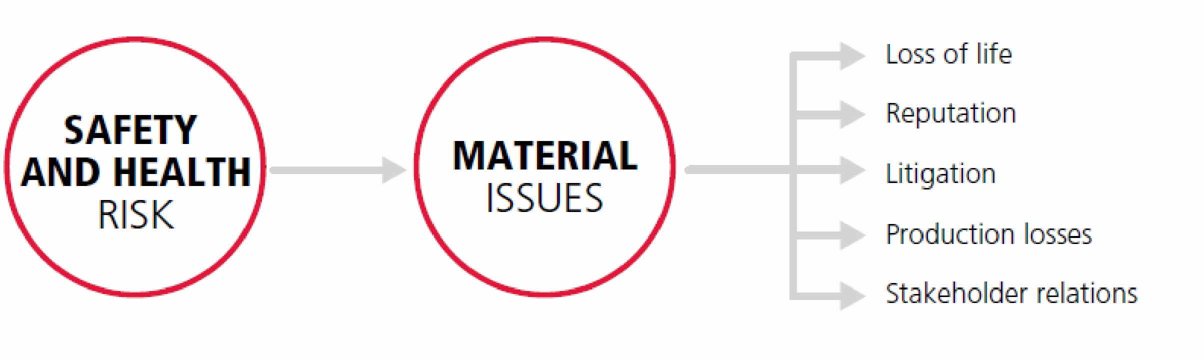
Achievements FY16	Challenges FY16
• The South African operations' lost-time injury and reportable injury frequency rates improved by 32% and 21% respectively year-on-year • Proactive, preventative model of healthcare service delivery continued to yield benefits, with decreased absenteeism, hospitalisation and medical mortality • Health-related absenteeism reduced by 11%. • Number of employees confirming their HIV/AIDS status increased from 41% to 73% • TB incidence rate down by 19% year-on-year • Actively involved with certification process to address backlogs and assist the mining industry in quantifying the silicosis risk	• Prevention of fall-of-ground and rail-bound equipment injuries remain a challenge • Behavioural breaches of safety standards are also a concern • Unhealthy behaviour and lifestyles which predispose employees to chronic and lifestyle diseases • Despite declines, the TB incidence rate remains unacceptably high in comparison with World Health Organisation standards and remains one of our top five health risks • Effective HIV/AIDS management remains a challenge, despite our deep understanding of the associated risks

RELEVANT MATERIAL ISSUES

- Keeping our people safe and healthy
- Protecting our licence to operate

At Harmony, the safety and health of our employees and contractors is a moral imperative and essential to creating a sustainable business. Safety is our number one value. Without a safe and healthy workforce, we cannot be productive and profitable. We aim to eliminate and prevent all fatalities and work-related injuries and illnesses by promoting a culture that values safety and health.

LINKS TO RISK



OUR APPROACH

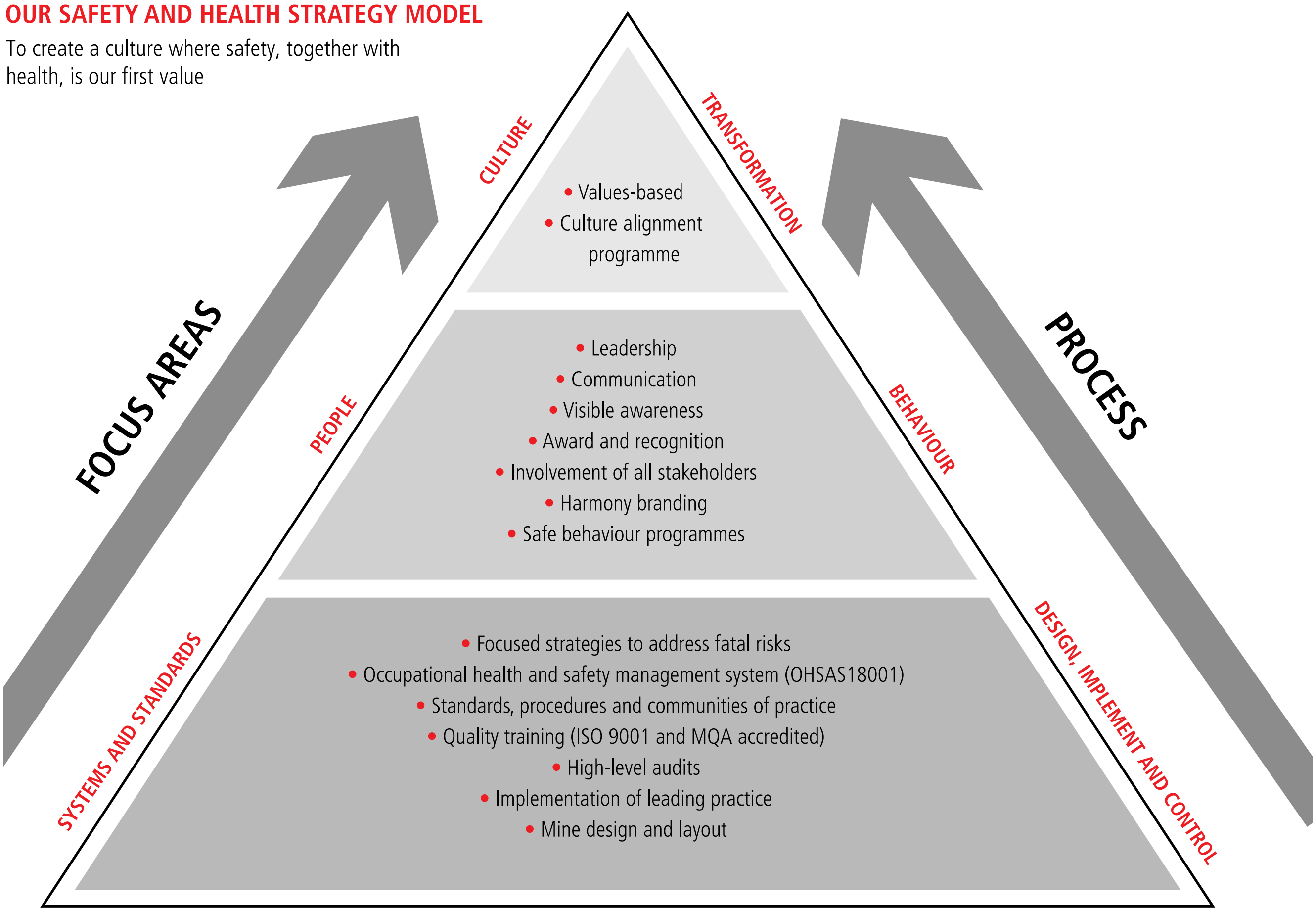
Both our occupational safety and health policy and management framework are aligned with the Mine Health and Safety Act in South Africa and mine safety and health legislation in Papua New Guinea. Representatives from all levels of management, union and government are encouraged to participate actively in our safety and health framework. The relevant strategy is guided by our safety and health policy.

Safety and health committees at all operations ensure the active participation of all employees in safety management. Safety and health are also agenda items at all union and management engagements. There are currently 30 full-time safety and health stewards at our South African operations (FY15: 34).

The technical committee, on behalf of the board, is responsible for approving and monitoring compliance with our safety and health policy. The social and ethics committee oversees public safety on behalf of the board. Safety performance, a key performance indicator for management, is monitored to determine remuneration in terms of the safety-related bonuses paid.

OUR SAFETY AND HEALTH STRATEGY MODEL

To create a culture where safety, together with health, is our first value



SAFETY

SAFETY STRATEGY – SOUTH AFRICA AND PAPUA NEW GUINEA

To achieve our goal of zero harm, continual improvement in our safety performance is required. A co-operative approach to safety ensures that the necessary infrastructure and systems are in place; from planning to communication and training. While management has legal responsibility for safety, management and employees have joint responsibility for their actions, to stop work when they believe that a workplace is unsafe and/or to prevent others from acting in an unsafe manner. Constant reinforcement of safe behaviour in the workplace is overseen by line managers and supervisors. Operations have introduced site-specific safe behaviour initiatives as well as behaviour re-enforcement programmes. Our safety strategy can be divided into three categories – short, medium and long term.

The **short-term safety strategy** comprises:

- risk assessments
- visible felt leadership in which management is actively seen to be involved in enhancing workplace safety
- proactive, regular and frequent communication at all levels of the company, including mass meetings, to promote safety awareness
- regular, weekly and monthly formal safety reviews to operational and regional managers. The Pivot safety system is used to analyse safety data and trends, enabling more informed decision making and quicker, more proactive responses to exposures and risks

The **medium-term safety strategy** involves the implementation of the fatal risk management system. Eight fatal risks – falls of ground, underground tramming, electricity, working at heights, winches, mud-rush and inundation, fire prevention and explosives – have been identified, for which fatal risk standards with measurable critical controls have been compiled. Roll-out of the standards which were finalised and signed off in July 2015, began in August 2015. Introductory meetings to explain the fatal risk management process and to establish steering committees to ensure and oversee the implementation of the standards have been completed at all operations. Standards training for all management teams and line supervisors down to team leader level was completed during the year as was that for all safety trainers. These trainers will play a key role in the roll out of the fatal risk management standards to the applicable employees at the work face.

Our **long-term safety strategy** focuses on the implementation of industry-leading safety practices and principles.

Safety performance at our Papua New Guinea operations is monitored by Harmony's South-East Asia team. Safety managers at the Papua New Guinea operations report to Harmony's South-East Asia executive committee through regular notifications, formal monthly reports, and meetings. This committee in turn reports to Harmony's technical committee and the board.

SAFETY PERFORMANCE IN FY16

Relevant Global Reporting Initiative indicators: G4-LA5, G4-LA6 and G4-LA8

Harmony's reporting on its safety performance is aligned with the reporting standards prescribed by the International Council on Mining and Metals.

Regrettably there were nine fatalities during the year at our South African operations (FY15: eight) and one fatality at our Papua New Guinea operation (FY15: 1).

In memoriam				
Date	**Operation**	**Name**	**Occupation**	**Cause**
18 July 2015	Hidden Valley	Piwas Kesa	Driver	Truck incident
25 July 2015	Target 1	Pheelo William Ramohlokoane	Security officer	Smoke inhalation
3 August 2015	Kusasalethu	Ezekiel Nonkevu	Tramming supervisor	Trucks, tramming and transport
6 August 2015	Joel	Cancel Nurse Malungane	Engineering assistant	Rail-bound equipment
15 November 2015	Masimong	Carlos Sitoe	Stoper	Gravity related fall of ground
9 December 2015	Target 1	Moeketsi Mongoako	Rock drill operator	Seismicity-related fall of ground
29 January 2016	Masimong	Motlatsi Samuel Lehana	Scraper winch operator	Gravity-related fall of ground
11 April 2016	Kusasalethu	Patuxolo Butshula	Water jet operator	Seismicity-related fall of ground
11 April 2016	Phakisa	Mncedisi Mbongwa	Rock drill operator	Gravity-related fall of ground
18 June 2016	Phakisa	Clinton Lewis Titmuss	Rigger	Trucks, tramming and transport

Fatalities

	FY16	FY15	FY14	FY13	FY12
South Africa	9	8	22	9	10
Papua New Guinea	1	1	–	–	–
Group total	**10**	**9**	**22**	**9**	**10**

Harmony provides the families of the deceased with counselling and financial assistance. A fund was established in FY14 to support the educational needs of the school-going dependants of all Harmony employees and contractors who lose their lives in the workplace.

While the fatal injury frequency rate for our South African operations regressed by 18% for FY16 (see table below) that for the Papua New Guinea operation increased marginally to 0.17 (FY15: 0.14). The lost-time injury frequency rate for the South African operations improved by 32%, and that for the Papua New Guinea operation deteriorated to 1.39 (FY15: 0.28). In all, 22 416 shifts were lost due to occupational injury in South Africa (FY15: 24 514) and 127 in Papua New Guinea (FY15: 145).

Fatal injury frequency rate (per million hours worked)					
	FY16	FY15	FY14	FY13	FY12
South Africa	0.13	0.11	0.28	0.11	0.12
Papua New Guinea	0.17	0.14	0.00	0.00	0.00
Group total	**0.13**	**0.11**	**0.26**	**0.10**	**0.11**

Lost-time injury frequency rate (per million hours worked)					
	FY16	FY15	FY14	FY13	FY12
South Africa	6.50	9.57	8.09	6.03	7.54
Papua New Guinea	1.39	0.28	0.00	0.12	0.45
Group total	**6.23**	**9.24**	**7.54**	**5.46**	**6.86**

South Africa

In South Africa, the measures in place to ensure that safety remains our first value are:

- Management coaches employees on how to work safely. These conversations are shaped by messages agreed by management in consultation with the unions, safety structures/representatives
- External safety initiatives or leading practices in the mining industry are reviewed and implemented through the Mining Occupational Safety and Health (MOSH), Community of Practice Adoption process (COPA). 'Champions' are nominated for each aspect of occupational safety and health. They attend all industry meetings and ensure that all relevant information is disseminated to the operations
- Phillip Tobias, a former regional general manager, was appointed chief operating officer with specific responsibility for, among other aspects, safety. A part of his remit, he visits different mining houses and companies to investigate best practice in safety and health strategies and structures. He will be responsible for adopting and implementing world best practice in health and safety strategies at Harmony
- A formal visible felt safety leadership coaching programme was rolled out to managers and superintendents to optimise safety engagement with subordinates to drive positive changes in behaviours

- Comprehensive safety reports allow us to track incidents, measure safety performance and report back to mines on performance. The Pivot safety management system is used at all South African operations as a management tool to improve safety. Data sourced from all workplace inspections by safety officers are recorded on the system and statistics are captured daily. The deliverables for the safety, health, environment, risk and quality Intranet Portal (SharePoint) document control management system, which includes a document centre, document review and approval workflow automation, was completed during the latter part of the year. Training of all applicable users is in progress
- Safety roles and accountabilities are clearly defined and used to measure team performance
- All employees are trained and encouraged to conduct pre-work risk assessments before any work is done. The relevant committees ensure that company standards on mining and engineering work are reviewed periodically, compiled, approved and distributed to operations for implementation

The number of section 54/55 instructions decreased to 182 (FY15: 229). Production lost during FY16 as a result of such instructions totalled 202.9kg (7 157oz) (FY15: 588kg; 18 904oz).

Year-on-year, the fall-of-ground injury frequency rate regressed by 30% to 1.64 (FY15: 1.26). There were three gravity- and two seismic-related fall-of-ground fatalities in FY16 (FY15: three gravity-related fatalities and no fall-of-ground fatalities).

Fall-of-ground injury frequency rate					
Per million hours worked	FY16	FY15	FY14	FY13	FY12
South Africa	1.64	1.26	1.53	1.29	2.22

Safety achievements in FY16:

Fatality-free performance		**Significant lost-time and reportable injury free performance**	
More than three million shifts	Target 1 (rail-bound equipment)[1] Phakisa (rail-bound equipment)[2] Randfontein surface operations[3]	More than three years	Joel plant[7] Phoenix plant[4] Target plant[5]
Three million shifts	Metallurgy; Kalgold (plant and pit) – achieved over 19 years Unisel (fall-of-ground) Surface operations (South Africa)	One-year	Asset Management Forum Central plant[8] Harmony Laboratory Harmony One plant Kalgold (pit and plant)[6] Surface Sources
Two million shifts	Doornkop (rail-bound equipment) Phakisa (including fall-of-ground) Joel (fall-of-ground) Tshepong (including fall-of-ground and rail-bound equipment) Unisel (rail-bound equipment)		
One million shifts	Masimong (fall-of-ground) Doornkop (including fall-of-ground) Kusasalethu (fall-of-ground and rail-bound equipment)		

[1] 7 million fatality-free shifts on rail-bound equipment	*[5] 6 years free of reportable injuries*
[2] 6 million fatality-free shifts on rail-bound equipment	*[6] 1 year free of lost-time and reportable injuries*
[3] 5 million fatality-free shifts	*[7] 5 years free of lost-time and reportable injuries*
[4] 9 years free of reportable injuries	*[8] 3 years free of lost-time and reportable injuries*

Papua New Guinea

In Papua New Guinea, measures are also in place to ensure that safety remains our first value. Critical control implementation and verification were implemented for all high-risk (potentially fatal) activities. Work menus, capturing the relevant critical controls, were developed for high-risk activities and rolled out through a training programme. To ensure the correct critical controls are implemented for these high-risk activities, an activity-specific verification process through formalised audits was implemented.

The mountainous terrain, high rainfall and quickly changing weather conditions in Papua New Guinea which contribute to landslides and/or slope failures make aviation and vehicle use much riskier activities.

Work undertaken during the year to mitigate the risk of vehicle-related incidents included:

- installation of on-board cameras to monitor driver behaviour for corrective training
- vehicle-specific emergency braking procedure training for all drivers
- manned mandatory stops for all trucks to verify permits and licences prior to entering mine lease areas and prior to certain hazardous declines

Natural landslides are relatively common and together with potential man-made landslides (slope failures associated with open-pit mining) pose a significant safety risk to our operations in Papua New Guinea. During the year, real-time slope stability radar monitoring systems were operational at both open pits and the failures were well managed throughout the year.

Specific geotechnical risk assessments are undertaken for all work sites in Papua New Guinea and associated mitigation plans are updated at least annually.

PUBLIC SAFETY

Following the methane explosion at the Brand1A ventilation shaft in Welkom in FY15, Harmony has repaired all damages to houses and properties at a total cost of R35 million. There are no outstanding claims.

During FY16, three community members lost their lives as a result of trespassing on hazardous mine sites at our Free States operations. Various interventions to prevent any recurrence were added to our existing public safety awareness programmes.

SAFETY OBJECTIVES FOR FY17

Our focus remains on achieving zero fatalities and realizing zero harm to our employees. The safety targets for FY17 have been set with the Mine Health and Safety Council milestone figures in mind. Consequently, our objective for the year is to improve the serious injury rate (reportable accidents) by 20% year-on-year. We are aiming for a year-on-year improvement in the total accident and injury frequency rates at the South African operations.

We will continue with our strategy to improve leadership and employees behaviour and safety messaging to affect a long-term shift in thinking and behaviour in terms of safety.

HEALTH

HEALTH STRATEGY

Relevant Global Reporting Initiative indicators: G4-LA7 and G4-LA2

South Africa

Harmony's proactive healthcare strategy focuses on employee well-being, with the main goal of ensuring that our employees are fit for life, which implies that they will be fit for work and retire healthy. This strategy aims to prevent illness and/or early identification of disease, through medical surveillance, active case finding, early detection and treatment as part of an integrated management healthcare system. We aim to take this strategy to the next level where we will review and build employee's resilience to any illness.

The Harmony healthcare programme provides primary, secondary and tertiary healthcare as well as occupational health services to all employees, through company-managed healthcare facilities and medical aid membership, as well as by means of external healthcare providers. Comprehensive health services continue to be provided in close proximity to the mine.

The lag in the certification process of occupational lung diseases by the Medical Bureau of Occupational Diseases remains a major challenge in the mining industry and for the Department of Health. However, the mining industry continues to collaborate with the department to find a sustainable solution. Harmony and several of its peers in the industry have committed medical doctors to assist in reducing the certification backlog at the Medical Bureau of Occupational Diseases. A total of about 5 000 cases have since been finalised.

The TB incidence rate at our South African operations remains alarmingly high compared with the World Health Organisation and national benchmark. In view of these current challenges, our new approach takes into account the multi-factorial aspects of TB management, which addresses both occupational and socio-economic determinants of the disease.

Motivating employees to confirm their HIV status, despite perceived stigma and confidentiality issues, remains one of the biggest challenges. Positive behaviour programme remains pivotal in addressing this challenge.

The "At work" management programme continues to yield good results by contributing to more people being at work. For the past year, more than 7 447 individual medical cases were reviewed by a team of healthcare professionals. The aim of this programme is to identify potentially chronically ill employees early, and to review and monitor their medical conditions.

Harmony's health team had several opportunities to showcase our proactive healthcare delivery model. The Deputy Minister of the Department of Mineral Resources visited Kusasalethu's health hub and delegates from the United Nations AIDS conference visited Doornkop.

Papua New Guinea

In Papua New Guinea, the provision of full-time primary healthcare and occupational health surveillance to employees, dependants and the local community is provided by medical centres at Hidden Valley, Wafi and Wau.

Upper respiratory tract infections remain one of Harmony's main medical issues in Papua New Guinea with nearly 2 438 presentations to the medical centres. An integrated business information system provides an administrative function for health. Medical registers are used to track and review each patient's progress from the first visit through to the final treatment.

A total of 13 131 health examinations took place at the Morobe Mining Joint Ventures' medical centres during FY16 (FY15: 13 715), of which 3 508 (FY15: 3 467) were random drug and alcohol tests.

HEALTH PERFORMANCE IN FY16

Healthcare delivery

In South Africa, membership of a medical scheme is compulsory for all Category 9(+) employees and is voluntary for Category 4 – 8 employees. Approximately 6 742 employees participated in medical schemes in FY16 (FY15: 6 700), with Harmony subsidising these costs by an amount of R12 million (US$0.8 million) per month (FY15: R11 million or US$0.9 million per month).

In all, 20 276 Category 4 – 8 employees have so far elected not to join a medical scheme. Instead they receive comprehensive health services from mine medical facilities and associated preferred providers at no cost to the employee.

Harmony undertakes active case-finding and screening as well as active disease management in respect of chronic conditions for employees who are not members of a medical scheme. In FY16, 15 137 (FY15: 8 600) employees had chronic conditions, with one third of these employees being treated for two or more chronic conditions. Chronic conditions include hypertension, HIV/AIDS, diabetes, asthma and TB.

Medical surveillance is ongoing at our dedicated occupational health hubs where 41 563 (FY15: 42 570) medical examinations were conducted during the past financial year.

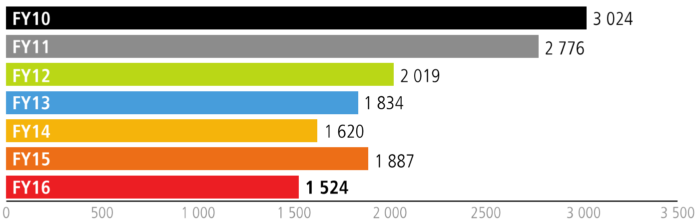
Tuberculosis

Tuberculosis (TB) is recognised as one of the most pressing public health concerns in South Africa and the gold mining industry. Harmony's TB control programme is in line with the relevant guidelines and prescriptions of the World Health Organisation. It is also in line with the national TB strategic plan.

Harmony's TB programme focuses on comprehensive screening and testing, the hospitalisation of infectious cases until sputum conversion, directly observed therapy short-course and contact tracing. As an affiliate of the Chamber of Mines, and through the Masoyise iTB campaign, Harmony will ensure that every employee is screened and tested for TB annually from 2016 to 2018. In the current year, a total of 29 077 employees were screened for TB.

Among our employees, a total of 214 cases of TB were certified (FY15: 288) in South Africa. This figure includes contractors, who have been included in the full TB programme since 2013. There has been a significant decrease in the number of new TB cases since the proactive healthcare strategy began in FY10. In FY16, three (FY15: three) new TB cases were reported during the year in Papua New Guinea.

TB incident rate – South Africa
Per 100 000



Cases of TB in South Africa					
	FY16	FY15	FY14	FY13*	FY12*
Certified	**214**	288	353	629	568
New cases	**461**	621	568	678	906

** Following its sale, Evander has been excluded from the FY12 – FY13 figures for comparative purposes*

HIV/AIDS

The HIV/AIDS pandemic in South Africa continues to have a significant impact on employees, their dependants and local and labour-sending communities. The illness can result in higher levels of co-infections of other diseases, increased absenteeism and reduced performance levels, loss of skills, increased economic burden, and sometimes death.

At the South African operations, 7 063 employees have been identified as being HIV-positive and are on the HIV/AIDS programme, with 5 333 receiving antiretroviral therapy. Harmony manages HIV/AIDS through its clinics, health professionals with the support of appropriate specialists. Harmony's HIV/AIDS strategy is based on promoting health through education and awareness programmes, preventative strategies to reduce the number of new cases, evidence-based curative interventions to ensure treatment, and ongoing monitoring of compliance.

For its new HIV/AIDS treatment targets beyond 2015, the Department of Health, in conjunction with the Joint United Nations Programme on HIV/AIDS (UNAIDS), has adopted the 90-90-90 targets which are globally aligned. Harmony has in turn aligned its HIV/AIDS programme with these ambitious and achievable targets, which are:

- By 2020, 90% of all people living with HIV will know their HIV status. Harmony currently at 73%
- By 2020, 90% of all people with diagnosed HIV infection will receive sustained antiretroviral therapy. Harmony currently at 74%
- By 2020, 90% of all people receiving antiretroviral therapy will have viral suppression. Harmony currently at 61%

In Papua New Guinea, the Hidden Valley joint venture continued to operate the new digital X-ray machine and medical laboratory to accurately diagnose tropical diseases, TB and HIV/AIDS.

Voluntary counselling and testing for HIV/AIDS

Pre-counselling and voluntary counselling and testing are offered to all employees through ongoing interventions at all Harmony healthcare hubs. A total of 30 294 (FY15: 19 234) employees received voluntary counselling and testing during the year and of these, 22 995 (FY15: 14 933) employees confirmed their status. The increase in the number of employees tested can be attributed to the introduction of positive behaviour reward programmes, among other health initiatives.

More than 500 personnel underwent voluntary counselling and testing for HIV/AIDS during the year at Hidden Valley in Papua New Guinea.

Occupational diseases

Silicosis

Silicosis is caused by long-term exposure to high levels of quartz silica dust and can cause increased susceptibility to TB. Silicosis in South Africa, and at Harmony, remains a material concern. The integrated Harmony HIV/AIDS, TB and silicosis policy and programme were developed to manage the debilitating disease responsibly so as to minimise the risk and to proactively prevent deterioration. The trend for silicosis indicates a decline in incidence.

During FY16, 284 cases of silicosis were submitted to the Medical Bureau of Occupational Diseases and 64 cases were certified (FY15: cases reported 313; cases certified 197).

As a member of the Chamber of Mines, Harmony participates in processes to address issues relating to historical silicosis cases. In May 2016, the High Court certified two classes for an occupational lung disease class action, being TB and silicosis. It is too early to estimate the amount of possible claimants or the possible claims as a result of the legal action against the gold mining companies.

The silicosis working group (initiated by the South African gold mining companies who are members of the Chamber of Mines) continues to search for a sustainable, inclusive and comprehensive solution for current and legacy dilemmas. Meetings with stakeholders continued during the year.

Project Ku-Riha (the Tsonga word for "compensation") was launched in May 2015 and is being rolled out by the Department of Health, with the goal of making substantial inroads into addressing the backlog of compensation claims from mineworkers who suffered occupational lung diseases while working in the mining sector, and ensuring that new valid claims are paid within a reasonable timeframe. Harmony and seven other South African mining companies continue to participate in this initiative. To date, 1 000 ex-miners have been tracked and paid compensation.

For the companies, an efficiently operating compensation system is a critical part of the comprehensive solution being sought. This project builds on work already done between the Department of Health and the Chamber of Mines that led to the establishment of the first two one-stop service centres in Carletonville and Mthatha. These centres offer medical examinations, rehabilitation assessments, health promotion and counselling to all patients, as well as referrals to other medical specialists if necessary. Patients can now be diagnosed, treated and receive the help they need to stay healthy, in one place.

Harmony and several other gold mining companies are actively participating in the process to integrate the Compensation for Occupational Injuries and Diseases Act (COIDA) and the Occupational Diseases in Mines and Works Act (ODMWA). This process, which is being led by the Department of Mineral Resources, the Department of Labour and the Department of Health, was launched in January 2016.

Industry milestone: eliminating silicosis

By December 2024, 95% of all exposure measurement results will be below the milestone level for respirable crystalline silica of 0.05 mg/m³.

Using present diagnostic techniques, no new cases of silicosis will occur among previously unexposed individuals (previously unexposed individuals are those unexposed to mining dust prior to December 2008 i.e. equivalent to a new person who entered the industry in 2009).Workshops have been conducted by the occupational hygienists from all operations to establish a strategy to achieve this milestone.

A decision was taken to set annual incremental targets to meet the milestone ahead of time, not to wait until the deadline. This will ensure that special focus can be put in areas where compliance is lacking. Of note is the fact that Harmony is currently 88% compliant with the new milestone attributed to all the engineering controls in place.

Despite experiencing around 3-4m of rain a year, in Papua New Guinea, which is a good dust suppression measure, testing for respirable silica dust began during the year focusing initially on higher-risk areas at Hidden Valley. Based on baseline data gathered up to the end of the year, the risk of personnel contracting silicosis is negligible.

Dust control

In order to decrease our employees' exposure to silica dust, Harmony uses a range of engineering controls to minimise dust. Mining Industry Occupational Safety and Health (MOSH) leading practices such as the fogger system at strategic underground areas and the implementation of foot- and side-wall treatment in identified intake airways to allay dust have been adopted.

In addition, multi-stage dust filtration systems have been installed. We are also in the process of installing winch covers for all of our winches. Progress on winch cover installation is 98.1% with a total of 1 037 units out of the 1 057 units having been fitted.

Training and awareness programmes address the concerns of dust control in stoping workplaces and all development ends are equipped with water blasts to settle dust directly after a blast.

Dust discharge occurs during activities where the rock is broken at source i.e. stoping, development and trackless mining. Engineering controls to allay dust at source are to be investigated through the Mining Industry Occupational Safety and Health dust task team. A prototype waterblast which can be used in both stoping and development is currently being tested. The testing resulted in changes to be made to the unit to accommodate robustness and effectiveness. This continued during the current year. A final product was developed which is being tested with apparent success. The final test results should be made available to industry soon.

Revision of airborne pollutant baselines to identify hotspots and to assess the effectiveness of engineering controls is in progress at all operations of which 96% (FY15: 91%) of total samples have been completed.

Noise-induced hearing loss

Harmony embarked on an Oto-Acoustic-Emissions initiative to detect early hearing loss. The Council for Scientific and Industrial Research collaborated and analysed the data and confirmed that Oto-Acoustic-Emissions detect damage two years earlier than an audiogram. We have received a proposal from Pretoria University researchers to continue with further technical developments that could help prevent noise-induced hearing loss.

All Harmony employees who are exposed to high noise levels are issued with personalised hearing protection devices, which reduce noise levels by 25 decibels.

During the year, 97.7% of occupationally exposed employees, including contractor employees (70.6%), were issued with personalised hearing protection devices (FY15: 98.9% and 59.6%). A progressive total of 23 226 personalised devices were issued in FY16 (FY15: 21 921).

Sound attenuators were also fitted to all equipment, resulting in no noise level exceeding 110dB(A)-weighted decibels from any machine, in compliance with our noise milestone.

New industry milestones for noice-induced hearing loss:

- By December 2016, no employee's standard threshold shift will exceed 25dB from the baseline when averaged at 2 000Hz, 3 000Hz and 4 000Hz in one or both ears
- By December 2024, the total operational or process noise emitted by any equipment must not exceed a milestone sound pressure level of 107 dB(A)

During medical examinations, audiometric testing for hearing loss is done at least annually at our occupational health hubs. The number of early noise-induced hearing loss cases (5-10% shift) decreased from 526 cases in FY15 to 371 in FY16.

An awareness drive was initiated at all operations to ensure employees are aware of the benefits of wearing personalised hearing protection. A monitoring programme was also implemented to measure actual compliance in the workplace. Compliance monitoring is undertaken during routine occupational hygiene inspections and ad hoc audits are also conducted.

As part of the initiative to prevent noise-induced hearing loss, 24 602 (FY15: 22 418) employees participated in the 'hearing coach promotion' initiative during the year. Evaluations were conducted and guidance provided where necessary regarding the use of customised hearing protection devices.

Heat stress

Extensive refrigeration and ventilation measures are in place at all operations where temperatures exceed normal working ranges. Heat-tolerance testing and acclimatisation programmes support and protect employees exposed to excessive heat in the workplace.

In FY16, 14 549 heat-tolerance tests were undertaken (FY15: 6 736). The observed increase in the number of tests is attributed to the increase in the frequency of screen testing at Masimong and Phakisa to mitigate associated health and business risks. Heat-related illness cases decreased from 23 to 20 cases in FY16 (decreased from 64 to 23 cases in FY15).

Radiation protection

All our operations in South Africa comply with the dose limit of 50 millisievert in a year and 100 millisievert in five years. Operational controls have been established to ensure that elevated monitoring results are investigated and corrected where required.

Radiological clearances are conducted at decommissioned sites to ensure the future declassification of these areas.

Managing chronic diseases

As part of Harmony's integrated approach to healthcare, specific initiatives have been implemented to manage chronic diseases, with our focus on HIV, TB, diabetes, hypertension and silicosis, as well as asthma and epilepsy. In FY16, 55% (FY15:42%) employees in South African operations have a chronic condition. Of the 15 137 employees diagnosed with chronic conditions, 33% have hypertension, 6% diabetes and 52% HIV/AIDS.

Harmony's health initiatives focus on the most common diseases and the e-learning module covers these diseases in the induction programme. Other initiatives include pamphlets, health-worker training, screening at all medical centres, disease management interventions and quality assurance. In addition, podcasts and liquid-crystal display monitors are used to help educate employees on HIV and promote voluntary counselling and testing.

Upper respiratory tract infections in Papua New Guinea

Hidden Valley is located approximately three kilometres above sea level and most employees reside in the lower, warmer areas; the regular change in altitude contributes to various respiratory ailments. Other factors contributing to these infections include air-borne pollen during peak flowering times which affects air quality. The heavy rainfall all year round maintains high levels of humidity (around 80-90%) which creates favourable conditions for fungus, bacteria and viruses to proliferate.

A total of 2 438 employees were treated for respiratory ailments in FY16 (FY15: 2 719). There has been a decline in the number of cases presented since FY12, with a decrease of 12% recorded for FY16. Harmony has successfully rolled out an employee educational programme on respiratory ailments and gastro-intestinal hygiene.

Malaria

Malaria is endemic to many parts of Papua New Guinea, which includes work sites such as Wafi Golpu and Lae but excludes Hidden Valley. Importantly, many employees and contractors working at Hidden Valley reside in areas where malaria is endemic, and this is where our community health projects play a vital role in combatting the disease.

Over the past three years, there has been a 73% decrease in the presentation of patients with malaria-like symptoms at the clinics in Papua New Guinea. This is as a result of several initiatives including support for provincial spraying and fogging programmes; standardised testing; distribution of treated mosquito nets and treatment regimes; and ongoing malaria awareness education.

Preventative healthcare

Health promotions and education Harmony carries out monthly awareness campaigns on various health-related topics such as HIV, TB, sexually-transmitted infections, occupational and lifestyle diseases. Continuous monitoring and education are conducted at the health hubs which oversee major health campaigns.

Positive behaviour reward programme The health services team has piloted an innovative positive behaviour programme to reward outstanding health behaviour and sustain testing for HIV/AIDS. This initiative was piloted in FY16 when we tested and confirmed 374 HIV-positive employees. Continuing with this initiative in the current financial year we have identified a further 299 HIV-positive employees who have been enrolled on our wellness programme. Adding on to the success of this pilot project, the health service team is considering initiatives to expand the scope to include a more comprehensive positive behaviour programme.

Influenza vaccines In South Africa, a total of 7 147 employees (FY15: 5 286) received influenza vaccinations during the year as a proactive measure to prevent illness during the winter season.

HEALTH OBJECTIVES FOR FY17

- Continued improvement in health-related absenteeism rates, specifically a 18% decline in absenteeism
- Launch of a comprehensive positive behaviour reward system to promote healthy lifestyles among employees
- Keeping the healthy healthier and creating a healthy culture within the company inclusive of contractors
- Provision of a proactive, individualised well-being programme which includes health risk assessments and development of individual risk profiles
- Continue to lead the industry with our healthcare model

EMPLOYEES AND COMMUNITIES

Relevant Global Reporting Initiative indicators: G4-LA1, G4-LA9 and G4-LA12

Achievements FY16	**Challenges FY16**
In South Africa:	In South Africa:
• Achieved management employment equity target of approximately 60% • Employee training and development: 1 748 504 hours (FY15: 1 757 704 hours) • Human resource development expenditure: 5.3% of payroll (on target) • Training in personal indebtedness: 16 033 employees trained to date • Hostel accommodation: 100% single-room occupancy rate maintained • Major Labour Court ruling in favour of gold companies in the dispute over extension of collective wage agreements entered into with majority unions to all employees at a "workplace" including members of a non-participating union. • Procurement expenditure with black economic empowerment entities of 76% exceeded Mining Charter targets	• Retaining the skills and experience required to operate efficiently • Managing inter-union rivalry • Competition for high-level engineering skills
In Papua New Guinea:	
• Papua New Guinea citizens make up 95% of workforce • Employee training and development: 44 896 hours	

WHY EMPLOYEES AND COMMUNITIES ARE MATERIAL TO HARMONY

Relevant material issues:

- Ensuring our workforce is safe and healthy
- Maintaining stability in our workforce
- Establishing a committed, dedicated culture of delivery
- Protecting our licence to operate
- Being relevant in the communities in which we operate

Our employees are essential to the conduct of Harmony's business. A stable, engaged, skilled and motivated workforce has an important role to play in the successful achievement of our business objectives.

Establishing and maintaining positive relationships with host communities is important in ensuring our licence to operate. Ongoing engagement with communities is necessary to understand, manage and respond to community concerns and expectations.

OUR APPROACH

Relevant Global Reporting Initiative indicators: G4-LA2

Our human resources initiatives focus on four underlying goals:

- Entrenching a single organisational culture
- Attracting and retaining employees with high potential
- Developing employees to meet operational skills requirements and improve efficiency
- Maintaining an effective employee performance management system.

Our employment policies, procedures and practices take into account and comply with the relevant labour legislation in South Africa and Papua New Guinea. Our recruitment initiatives focus on local communities in both countries. A review of all human resource procedures and policies is ongoing, including remuneration and incentive schemes.

As many of the communities associated with our operations are in socio-economically distressed regions, much of our engagement with and initiatives relating to communities focus on employment creation, education and training and development, especially where mines are near closure.

EMPLOYEES

PERFORMANCE IN FY16

South Africa: At the end of FY16, our employee complement was 30 441 (FY15: 31 012), 85% (FY15: 84%) of whom were permanent employees and 15% (FY15: 16%) contractors. More than 75% (FY15: 75%) of the South African workforce was drawn from local communities.

During FY16, 135 employees retired and 311 were retrenched, of whom 78 accepted voluntary retrenchment packages.

Our cultural alignment programme continued with 66 (FY15: 68) management employees completing the training in FY16. The aim of this programme is to achieve cultural cohesion throughout the company by shaping leadership, and empowering and engaging employees. Performance improvement in terms of production and safety is beginning to show as a result of this cultural alignment programme.

Papua New Guinea: The staff complement of 106 (FY15: 102) at the end of FY16 excludes employees of Morobe Mining Joint Ventures. Of these, 72% (FY15: 74%) were permanent employees and 28% (FY15: 26%) were contractors working on specific construction projects. A total of 95% (FY15: 96%) were local.

EMPLOYEE ENGAGEMENT

In applying our value of “connectedness”, we ensure that employees feel part of the Harmony family. Internal communications is a continuous interactive process and includes regular meetings with heads of departments, work groups and general manager engagement platforms (mass meetings and quarterly productivity meetings). We also use print (posters, internal newsletters, memos and flyers), and digital (mine television, intranet, website and text messaging) and social media (Twitter).

The chief executive officer communicates regularly with employees by e-mail, at meetings and during internal roadshows.

For employees to be committed, productive and conscientious in their jobs, we believe they should feel valued. To this end, we ensure that our employees understand their roles within the company and what is happening at the company and in the industry. They are the first to hear important news. Regular employee engagement involves communication both to and from employees. Furthermore, suggestions made by employees are taken seriously and if necessary are acted upon

EMPLOYEE SHARE OWNERSHIP: SOUTH AFRICA

When Harmony launched the Tlhakanelo Employee Share Ownership Plan in FY12, all non-managerial employees became eligible to be shareholders with a total potential stake of 2.9% in Harmony.

Currently, 24 621 employees participate in the share plan. In FY16, the Tlhakanelo share plan realised R49 million (US$3.4 million) (FY15: R43 million; US$3.8 million) for employees. For more details, please refer to the Remuneration Report.

LABOUR RELATIONS

Union leadership empowerment programme

An empowerment programme aimed at sharing business imperatives and performance, company strategy and an understanding of business principles was initiated in FY15. Several union representatives have attended the programme.

South African gold wage negotiations

Relevant Global Reporting Initiative indicators: G4-EC5

Harmony negotiates changes to wages and other conditions of employment through a recognised collective bargaining structure, at a centralised industry forum under the auspices of the Chamber of Mines. In FY16, a three-year wage agreement was reached with the unions representing the majority of employees at Harmony and was extended to all employees in the bargaining unit. For more information, please visit www.goldwagenegotiations.co.za

Labour disputes and strikes

Relevant Global Reporting Initiative indicators: MM4, G4-LA16 and G4-HR11

Labour disputes and strike are considered a material issue because, in addition to the resulting loss of production, disputes affect morale and reputation, and present a risk to non-striking employees, communities and company assets. In March 2016, the Labour Appeal Court found in favour of the gold companies that participate in centralised, collective bargaining in terms of an appeal by the Association of Mineworkers and Construction Union against the decision of the Labour Court to uphold an interim order preventing the union from embarking on strike action in terms of the collective wage agreement reach in 2013. This decision has contributed to stability in the gold mining sector.

South Africa

To mitigate the risk of labour disputes, we constantly engage with organised labour at mine and company level. Human resources adopts a proactive approach in addressing employees' queries through established structures and processes.

Harmony has embarked on various initiatives to address the scourge of employee over-indebtedness. These include, among others, financial literacy training, discontinuation of non-statutory payroll deductions and notifying employees about emolument attachment orders against their pay. In all, 16 033 employees (FY15: 10 778) have attended the financial literacy programme since its launch in September 2013.

Papua New Guinea

We participate in ongoing engagement with all stakeholders, including employees, provincial and local government, landowners and regulators.

NOTEWORTHY ACTION **Maintaining peace and stability in our workforce**

We endeavour to maintain peace and stability in our workforce at all times. We want our employees to feel and be safe in all aspects at work.

Our multi-union environment promotes co-existence, inclusion and collaboration. Our accountability value extends to unions with all labour relations structures and processes bound by national legislation, agreement and best practice. In addition to quarterly regional meetings with unions, we also encourage proactive and robust engagement to address issues. As communication is ongoing at all levels, we are in daily contact with full-time stewards while our general managers/human resources leaders interact regularly at branch level and with shaft committees.

Harmony engages with unions on a wide range of employee-related issues, such as housing, human resources development and employment equity, and we communicate details of our operational performance to union structures on a monthly basis.

We also work directly with our employees to address a number of issues that are key to our relationship, including production incentive reviews and financial literacy to address indebtedness and replace payroll deductions with a new system to manage emolument attachment orders and garnishee orders.

Freedom of association

Relevant Global Reporting Initiative indicators: G4-HR4

We recognise the right of employees and contractors to freedom of association and adhere to collective bargaining processes and the resulting collective agreements in each country. Honesty is one of our values. We strive for honest, two-way discussions through collective bargaining.

South Africa: Harmony recognises four labour unions. In FY16, union representation included the National Union of Mineworkers at 60% (FY15: 66%), the Association of Mineworkers and Construction Union at 24% (FY15: 15%), the United Association of South Africa at 8% (FY15: 10%) and Solidarity at 2% (FY15: 2%). A total of 6% (FY15: 7%) of employees were non-unionised.

Papua New Guinea: There are no active unions. Industrial relations at Hidden Valley are currently managed by the mine's employee representative committee.

Representation by union – FY16 (%)

TRAINING AND DEVELOPMENT

South Africa

Relevant Global Reporting Initiative indicators: G4-LA9

All training and development programmes are conducted in line with the company's strategic and operational needs and include skills development, adult education and training, learnerships, graduate development, talent management, and supervisory and leadership development. Some 5.3% (FY15: 4.9%) of the payroll was spent on human resource development.

In addition to upskilling our own employees, we recognise that community members can benefit from our programmes. We devote considerable effort to programmes such as bursaries and the bridging school that allow young learners from local communities to improve Matric results and continue their studies. This has the potential to benefit Harmony in the long run, too, as it encourages promising students to take up careers in the mining industry.

In FY16, 92% (FY15: 96%) of our workforce received training at a cost of R364 million or US$25.1 million (FY15: R371 million or US$32.4 million), including support for South African-based research and development initiatives in exploration, mining, processing, technology efficiency, beneficiation and environmental conservation.

In FY16, 68 people (FY15: 69) were trained in critical skills, including but not limited to mentorship, hazard identification and risk assessment, mineral resource management and various other courses through study assistance programmes.

To facilitate transformation in South Africa, employees received training in diversity management so as to facilitate proper implementation of employment equity. Feedback from the diversity dipstick survey was shared with all operations and action plans were implemented to address issues of concerns identified per site.

The Mining Charter in South Africa places significant emphasis on training and development. At the end of our reporting period, Harmony's operations met the requirement that 5% of the payroll costs be spent on employee training and development.

Adult education and training

Relevant Global Reporting Initiative indicators: G4-LA10

Adult education and training centres at Harmony's South African operations run full-time classes to ensure that employees are functionally literate and numerate so as to allow for personal growth and transformation within South Africa.

In FY16, 412 employees (FY15: 476) and eight (FY15: seven) community members were enrolled in classes at a cost of R28 million or US$1.9 million (FY15: R32 million or US$2.8 million).

The overall average pass rate in FY16 was 56% (FY15: 53%), a 3% improvement on the previous year. Piloting of e-learning at the adult education and training centres at Joel, Masimong and Unisel began in August 2015. E-learning is expected to increase the number of participants in the programme as employees will be able to study after hours at their own pace.

Bursary programme

Harmony offers a bursary programme and a subsequent graduate-development programme. A total of 52 (FY15: 33) bursaries were awarded for university studies during FY16 – 51 of these students came from local communities (FY15: 29).

Bridging school

Harmony's bridging school supports mathematics and science at grade 12 level to assist school leavers in improving their final results to gain admission to tertiary studies. Upon successful completion of grade 12, some are awarded bursaries while others follow the learnership route, increasing the company's learnership intake.

Since inception of the school in 1996, we have registered a total of 410 students. Of the total number enrolled over the years, 25 (6%) were awarded bursaries and 310 (76%) attended our learnership programme. The balance were appointed to various permanent positions within Harmony, and some now hold positions in management.

Learnerships

Harmony runs formal learnership programmes. In FY16, 214 (FY15: 247) learners were enrolled at different levels and 100 (FY15: 55) completed their learnerships. Most have been appointed to critical positions within the company.

Internship and experiential programmes

In support of our social and labour plans, we hosted 65 students (30 internships and 35 experiential trainees) during FY16 (FY15: 71 students – 48 interns and 23 trainees). Of the total number hosted, 18 (FY15: 25) completed their programmes in FY16 and, of these, six were employed.

Social plan programme

Through our social plan programme, facilitated by the 2003 framework agreement between Harmony and the National Union of Mineworkers, we continue to provide alternative skills training to employees (current and retrenched). This enables people to remain economically active beyond mining. It also cushions the impact of unavoidable retrenchments for economic reasons or when our mines reach the ends of their lives.

Future forums

Future forums comprising representatives from mine management and organised labour, have been set up to deal with issues such as productivity improvements and long-term mine sustainability, job security and creation, and the impact of downscaling and retrenchments on employees and their families, communities and the local economies.

The forums are consensus driven and operate in a completely transparent environment. The culture and approach of the forums is one of joint problem solving, with management and organised labour negotiating to prolong the life of the mine so as to achieve the best possible benefits for all stakeholders.

Portable skills development

In FY16, 1 545 employees (FY15: 425 received portable skills training, around 52% (FY15: 83%) were proxies (dependants of mine employees). To date, Harmony has provided portable skills training to about 6 000 employees (and/ or their proxies) – in basic electrical, basic computer literacy, basic welding, basic motor mechanics, clothing manufacturing, furniture making, plumbing, bricklaying, animal husbandry, and mixed farming systems – over a period of eight years.

Papua New Guinea

In FY16, workforce training events were conducted at Morobe Mining Joint Ventures in Papua New Guinea, including:

- Production training
- Safety compliance training
- National Training Council Accreditation compliance
- Professional development
- Computer software courses
- Supervisor development programme

Employee educational support

Harmony and Morobe Mining Joint Ventures provided R1.5 million or US$105 000 (FY15: R44 million or US$3.9 million) in educational support for 352 (FY15: 347) employees and their dependants in Papua New Guinea.

Morobe Mining Joint Ventures' landowner school tuition assistance

The Morobe Mining Joint Ventures tuition assistance programme for the children of Hidden Valley and Wafi Golpu landowners received R0.7 million or US$0.1 million in FY16. The money was used for school fees for 94 successful applicants, their general upkeep and stationery during the year.

Women's development programme

During FY16, women participated in a number of programmes that included agricultural training. The women from Upper Watut and Wafi Golpu participated in learning how to manage a coffee nursery, and to germinate and raise coffee seedlings. They also learnt how to produce compost to improve the soil, prune coffee plants during growth, and general tending of the nursery. The Wafi Golpu women also participated in training on how to prepare and germinate vegetable seedlings so as to produce quality vegetables that could be sold to generate income for themselves and their families. At Wafi, women learnt how to cook nutritious meals, and to make and bake scones and bread. These were also sold at local community markets. The aim of the programme is that the women will continue to use their new skills as a source of income.

Education programmes

The Wafi Elementary School Programme established five new schools and trained 43 new teachers. Funding supported teachers' allowances, school stationery and uniforms. The Wafi Golpu Project will continue to provide this support until the schools are registered with the National Department of Education and the government takes over their management. To date, approximately R0.4 million or US$0.03 million has been invested.

An adult literacy programme for nine Wafi landowner communities was undertaken in FY2016, 15 new teachers were trained and 288 landowners participated.

A training programme for personal viability was funded and 30 people from the seven Hidden Valley landowner villages were trained. The training facilitates a mind-set shift for communities away from heavy dependence on mine-related incomes such as royalties and business opportunities towards non mine-based and more sustainable livelihood opportunities. The course has been accredited by the Papua New Guinea National Training Council and participants are awarded certificates upon completion. Approximately R0.3 million or US$0.02 million has been invested so far in this programme.

EMPLOYMENT EQUITY

Relevant Global Reporting Initiative indicators: G4-EC6 and G4-HR3

South Africa

A representative workforce is a legislative and moral imperative in the interests of economic growth benefits for all stakeholders. We ensure that our migrant employees are able to return home regularly and we facilitate family visits with spouse quarters.

We have several local economic development projects in labour-sending areas, as well as an agreement to provide home-based care to medically incapacitated employees from all areas.

Harmony reports its employment equity plan and progress to the social and ethics committee quarterly and to the departments of Labour and Mineral Resources annually.

In FY16, 60% (FY15: 58%) of Harmony's management staff were historically disadvantaged South Africans, exceeding Mining Charter targets for company level compliance.

Women employed at management level improved to 17% (FY15: 16%). There is no difference in the salary scales for men and women at Harmony.

Employment equity performance

	Historically disadvantaged South Africans		
Occupational categories	Target (%)	Achieved June 2016 (%)	% of women by category
Board	40	**40**	21
Top management (executives)	40	**50**	20
Senior management	40	**47**	22
Middle management	40	**48**	19
Junior management	40	**62**	16
Core and critical skills	40	**58**	6

Papua New Guinea

We focus on attracting and retaining externally and locally recruited employees, particularly landowners and local citizens.

Operations are governed by a three-year training plan lodged with the Department of Labour. Under this plan, the joint ventures must ensure that locally sourced employees are continuously trained and succession is managed.

HOUSING AND LIVING CONDITIONS IN SOUTH AFRICA

Improved living conditions for our employees are directly linked to enhanced employee well-being and productivity. In this regard we make the following housing options available to our employees: 15 606 receive the living out allowance of R2 100, 1 346 receive a housing allowance, 959 receive a housing assistance allowance and 7 252 live in single room hostels. In addition, our housing programme creates jobs and supports local business. Harmony only appoints local empowered companies when embarking on construction projects.

Our housing strategy promotes home ownership and rental options, and aims to integrate mining communities into local municipal structures. We make land available and facilitate affordable housing development on redundant mine land.

In line with our focus on home ownership, employees who do not live in company residences (hostels) receive a living out or housing allowance. We still own and make available more than 1 900 houses in mine villages across our operations.

The hostel de-densification programme was completed at the end of 2014 and ensures that employees have access to private single rooms. To enable employees to move their families closer to our operations, our hostel conversion programme makes family units available to the general mining communities.

Housing and living conditions: performance against the 2014 Mining Charter targets

		2016			2015		2014	
	Target (%)	Planned	%	Achieved	%	Achieved	%	Achieved
Residences (hostels) single room occupation	100	One person per room	**100**	**[1]8 796**	100	8 695	19	[1]1 678
Hostels (non-operational) conversion to family units	100	1 100	**86**	**945**	84	927	69	761
Facilitation of home ownership		4 700	**66**	**[2]3 117**	63	[2]2 961	59	2 800
Total			**84**		82		49	

[1] The number of single rooms available
[2] Houses sold to employees and other housing development programmes (actual achieved will depend on employee affordability profiles and the ability to obtain finance). Certain elements are beyond Harmony's control, such as whether employees are granted bonds or receive state subsidies. Bank lending, affordability and indebtedness remain stumbling blocks to increased home ownership.

Of those employees residing in our hostels, all are accommodated in single rooms. Of the 1 100 family units to be built over three years, 945 (FY15: 927) units have been built to date – 86% (FY15: 84%) of the total planned. This includes 448 family units built at the Merriespruit housing project which has now been completed. Post year end, the Merriespruit housing project was awarded first place in the provincial community residential unit category in the Free State.

To further facilitate home ownership, we subscribe to and support the pension-backed home loan scheme negotiated for the industry by the Chamber of Mines. In all, 1 072 (FY15: 1 441) of our employees are using this facility, with a reduction in the number of subscribed employees paying off their loans. During FY16, 156 (FY15: 110) houses were purchased by way of a 'rent-to-own scheme'.

HUMAN RIGHTS – FOR EMPLOYEES AND COMMUNITIES

Relevant Global Reporting Initiative indicators: G4-LA14, G4-HR3, G4-HR10 and G4-HR12

Respect for human rights is entrenched within the company's values and specifically catered for in human resource policies, charters and contracts of engagement. This is closely monitored by our human resources function and community engagement managers at operational level.

We abide by the human rights conventions of the International Labour Organisation, as supported by the South African Constitution. Our adherence is monitored by the social and ethics committee. In addition, certain human rights requirements are built into contracts with new suppliers. No incidents of discrimination were reported in South Africa or Papua New Guinea in FY16.

The South African constitution also prohibits forced, compulsory or child labour. None of Harmony's operations are at risk of human rights contraventions and no contraventions of these principles were alleged or reported in FY16.

COMMUNITIES

SOCIAL AND LABOUR PLANS

Relevant Global Reporting Initiative indicators: G4-EC4

Harmony's operations in South Africa are governed by the allocation of mining rights, bound by an approved social and labour plan. Our policy includes local economic development initiatives executed in terms of the Mining Charter, the Mineral and Petroleum Resources Development Act and the codes of good practice for the minerals and mining industry. Please refer to the Mining Charter Compliance Scorecard for the status of our achievements in terms of the Mining Charter targets set for 2014.

Projects and programmes are considered, approved and monitored by a corporate social responsibility committee at management level. We identify suitable programmes through stakeholder engagement and in partnership with the Chamber of Mines' community development forum, non-governmental organisations, communities, government departments, municipalities, educational institutions, and the governments of Lesotho and Mozambique.

For the five-year social and labour plan cycle ending December 2017, Harmony's planned expenditure on commitments made in terms of our social and labour plans (the mine community development projects), amounted to R844 million (FY15: US$57.3 million) of which, as at 30 June 2016, R430 million (US$29.2 million) had been spent (FY15: R405 million; US$33.3 million).

Our social and labour plans are aligned with municipal integrated development plans so as to ensure we make relevant and sustainable contributions to local communities.

A Harmony-led forum meets regularly, bringing together stakeholders to discuss and agree on key projects for the Free State goldfields region with the aim of identifying and developing industries lacking in the local economy and the enterprises necessary to service those industries.

Expenditure on local economic development in South Africa declined to R17 million or US$1.2 million in FY16 (FY15: R72 million or US$6.3 million), as a result of the mines' reduced levels of profitability and consequent inability to fund these projects, in the first half of FY16.

SOCIO-ECONOMIC INVESTMENT

Relevant Global Reporting Initiative indicators: G4-SO1 and G4-SO2

We are committed to the sustainable socio-economic development and well-being of our host communities long after mining has ceased. We endeavour not just to comply with laws and regulations but to conduct regular meetings with stakeholders, such as government and community leaders, to address concerns, grievances and misperceptions.

Local economic development spend

	FY16		FY15		FY14	
	R million	US$ million	R million	US$ million	R million	US$ million
South Africa	**17**	**1**	63	6	72	7
Papua New Guinea	**1**	**0.1**	1	0.1	5	0.5
Harmony – total	**18**	**1.1**	**64**	**6**	**77**	**7**

* *An additional R89 million (US$8 million) was spent on hostel upgrades in FY15*
** *An additional R106 million (US$10 million) was spent on hostel upgrades in FY14*

Corporate social responsibility

Our corporate social responsibility policy recognises the need for socio-economic investment in South Africa and Papua New Guinea, starting with the broader communities in which we operate, and our activities are monitored at board level by the social and ethics committee.

In FY16, Harmony spent R9 million or US$0.6 million (FY15: R6 million or US$0.5 million) on corporate social responsibility projects.

Harmony's corporate social responsibility priorities in FY16 concentrated on implementing programmes in mathematics, science and technology advancement, community project-based entrepreneurial skills development, sports and recreation development.

To date, Harmony has invested approximately R19 million or US$1.3 million (FY15: R17 million or US$1.5 million) on developing host communities and labour-sending areas in South Africa.

In Papua New Guinea, regulatory control vests in a memorandum of agreement between Morobe Mining Joint Ventures and local communities as well as key landowners with similar social commitments to those in South Africa. Corporate social responsibility projects and programmes are considered, approved and monitored by the head of our Southeast Asian operations.

Focus remained on health, education, agriculture and infrastructure in FY16. Hidden Valley's infrastructure programme focuses on constructing, repairing and upgrading roads, bridges, educational facilities, health facilities and water supply in the three landowner villages of Nauti, Kuembu and Winima, as well as impacted communities along the Watut River corridor.

A total of 324 jobs were created in South Africa by Harmony during the year. Details of upliftment projects can be found on the Harmony website at www.harmony.co.za/sustainability.

PROCUREMENT

Relevant Global Reporting Initiative indicators: G4-LA15 and G4-SO10

We recognise that extending our supplier network to include emerging businesses enables a more equitable distribution of economic benefits.

South Africa

Our preferential procurement strategy complies with legislation, and procurement processes and expenditure are governed by our group strategy and policy. We support this approach by helping to develop the business management skills required for emerging enterprises to succeed.

Our preferential procurement strategy encompasses:

- regional enterprise development centres, which make it easier for qualifying suppliers to do business with our company
- amending tender policies to help Harmony meet Mining Charter requirements
- measuring each mine's procurement from historically disadvantaged South African entities against targets in the Mining Charter scorecard
- small, medium and micro enterprises and/or historically disadvantaged South African-compliant vendor development aimed at maintaining acceptable standards

Our preferential procurement strategy promotes expenditure with companies recognised as black economic empowered entities under the Mining Charter.

In FY16, procurement expenditure with black economic empowerment entities was R3.4 billion or US$0.2 billion (FY15: R3.8 billion or US$0.3 billion); equivalent to 76% (FY15: 69%) of total discretionary spend.

Our performance in relation to the Mining Charter's black economic procurement targets as a percentage of total spend:

Category	Mining Charter target	FY16*	FY15
Capital goods	40	**81**	76
Services	70	**79**	70
Consumables	50	**76**	66

** Calculation is based on Harmony's financial year 1 July 2015 to 30 June 2016*

Papua New Guinea

As agreed with government authorities (local, regional and national), landowners and communities, we issue contracts to local citizens wherever possible.

Supply expenditure by Morobe Mining Joint Ventures in FY16 amounted to R2.9 billion or US$203 million (FY15: R3.0 billion or US$267 million) of which R1.8 billion or US$123 million (FY15: R2.2 billion or US$193 million) or 61% (FY15: 72.2%), was expended in Papua New Guinea. Of this amount, R734 million or US$50.6 million (FY15: R1.2 billion or US$108 million) was spent in Morobe Province on goods and services. Contracts were awarded by Morobe Mining Joint Ventures to local landowner companies for catering, fuel haulage, general freight, plant hire, security, labour hire, cleaning, rehabilitation and bus services.

In line with Hidden Valley's current memorandum of agreement, Morobe Mining Joint Ventures continues to offer business development opportunities to landowners. These opportunities will increase with the proposed development of the Golpu project.

ENVIRONMENTAL PERFORMANCE

Achievements FY16	Challenges FY16
In South Africa	In South Africa

• Harmony's comprehensive mine rehabilitation programme, which employs around 200 people, was accelerated. Another four areas were demolished and rehabilitated, bringing the total number of areas since the programme began in 2010
  ○ Allied to this, steady progress was made with the Matjhabeng land rejuvenation programme in the Free State including the start of an agricultural project for olives and vegetables
  ○ Entered into partnership with POPCRU – donated land and buildings for a training academy for police and correctional services
• Diversification of our energy mix driven by procurement of solar and development of biomass energy
• Bio-energy plant is due to generate first gas in September 2016
• Solar parks being planned and implemented will generate 30MW on site
• Novel rehabilitation strategy implemented at Kalgold involves transforming the D zone pit into a waste storage facility
• Water treatment plant constructed at Kusasalethu to promote water conservation and achieve zero discharge – now fully operational. Work has begun on a water treatment plant at Doornkop
• Good progress made to conserve habitat of the lesser flamingo in Welkom
	• A significant water spillage from the return water dam at Kusasalethu occurred following heavy rains and pump failure. A water treatment plant installed in May 2016 will reduce the volume of water stored, creating capacity to buffer the rains
	• Environmental legislative reform can result in more stringent and often-times onerous and impractical requirements
	• New regulations on related financial provisions are often complex and may have a negative impact on management of environmental liabilities
	• The pending carbon tax and increased cost of electricity may affect the sustainability of operations. While the drought in South Africa threatened business continuity, it also resulted in our transforming our business to protect against the impact of drought in the future

In Papua New Guinea	In Papua New Guinea
• Close-out information for environment improvement plan at Hidden Valley was presented to the Conservation Environment Protection Authority for adjudication • Level 2A environmental licence received for Kili Teke	• Drought resulted in potable water extraction points at Hidden Valley drying up, for which remedial steps were taken
At group level	
• Achieved total electricity savings of 69 937MWh and on track to achieve five-year target in FY18 • Carbon Disclosure Project: on the global A lists for both climate change and water	

WHY THE ENVIRONMENT IS MATERIAL TO HARMONY

In line with our values, we are accountable for the impact we have on the environment – land, water, air – and for the responsible use of the natural resources we consume. Our business activities and processes can negatively impact the natural environment and surrounding communities, and we have a responsibility to prevent, mitigate, manage and minimise any impacts.

Relevant material issues:

- Protecting our licence to operate
- Managing our environmental impact
- Reducing our environmental footprint
- Delivering lasting environmental benefits

Relevant Global Reporting Initiative indicators: G4-EN22

Total expenditure on our environmental portfolio in FY16 was R69 million (US$4.8 million) (FY15: R64 million; US$5.6million) of which R53 million (US$3.7 million) (FY15: R34 million; US$3.0 million) was spent in South Africa and R16 million (US$1.1 million) (Harmony's 50% share) in Papua New Guinea (FY15: R15 million; US$1.3 million). In addition, R50 million (US$3.4 million) has been committed to the implementation of the bio-energy initiative in South Africa.

OUR APPROACH

Our environmental strategy is aimed at managing our impacts, related risks and environmental liabilities, at responsible stewardship, compliance with environmental legislation and regulations, and at instilling a culture that shares knowledge and experience within and outside the group.

Harmony's environmental strategy and performance are overseen by our social and ethics committee. An executive environmental manager and an environmental leadership team drive environmental improvement strategically at group level. This is cascaded down to the operations. At each operation, general managers are accountable for environmental management, in line with annual environmental management plans that identify opportunities to improve compliance and minimise our overall impact on the environment.

Our board-approved environmental policy, available at www.harmony.co.za/sustainability/governance#policies, supports our environmental strategy while operations are guided by technical and performance standards, incorporated into environmental management systems and implemented in line with ISO 14001. This policy outlines our commitment to responsible environmental stewardship and sustainable mining and closure. Environmental management programmes include detailed closure plans, developed for each operation within five years of planned closure, to expedite beneficial post-mining land use and sustainable community livelihoods.

By year-end at our South African operations, seven of our long-life mining operations and five of our processing facilities had been certified in terms of ISO 14001. Gap audits were completed at Bambanani and Joel and on-site reviews are in progress with certification audits scheduled for December 2016.

In Papua New Guinea, as Hidden Valley's environmental management plan is aligned with the ISO 14001 standard, environmental awareness training is provided to all new employees, and reinforced by leadership training courses as well as monthly initiatives.

Environmental and climate change legislation

South Africa: Our activities are regulated by the Mineral and Petroleum Resources Development Act, 2002 (Act No 28 of 2002), the National Environmental Management Act, 1998 (Act No 107 of 1998), the National Water Act, 1998 (Act No 36 of 1998) and the National Nuclear Regulator Act, 1999 (Act No 47 of 1999). Environmental management programmes for each operation are approved by the Department of Mineral Resources.

Environmental legal reform has led to more stringent but often impractical and onerous expectations by regulators, relating particularly to the Waste Management Act which calls for all tailings dams to be lined. In addition, the financial provision regulations promulgated in November 2015, which may apply retrospectively, require mining companies to provide for latent liabilities that are complex issues.Harmony is working with government, through the Chamber of Mines, to rationalise the legal framework.

The pending carbon tax, together with increased electricity costs, may affect the sustainability of operations. Although details of the carbon tax have not been confirmed, government is to implement the tax in the coming financial year. Harmony has de-risked energy security and carbon tax concerns by increasing procurement of cheaper energy from renewable sources.

Papua New Guinea: Applicable environmental legislation, issued by the Conservation and Environment Protection Authority, regulates water extraction by and waste discharge from the mining tenements. The transition from Department of Environment and Conservation to the Conservation Environment Protection Authority continued in FY16 and will continue into FY17.

Environmental incidents

Relevant Global Reporting Initiative indicators: G4-EN24, G4-EN29, G4-EN34

Our environmental management plans provide for monitoring, reporting and remediation of environmental incidents, including direct or indirect discharges of water beyond our mining area. Incidents are classified on a scale of 1 to 5 and, by law, we are required to report on incidents at level 3 and higher.

Relevant Global Reporting Initiative indicators: G4-EN8, G4-SO8

During FY16, we reported one significant level 3 incident, at Kusasalethu in South Africa. In March 2016, spillage occurred from the mine's return water dam following heavy rains and pump failure. A new water treatment plant, which came into operation at the end of June 2016, will reduce the volume of water stored and create capacity to accommodate an increase in water to be stored when it rains. It will also reduce our use of potable and fresh water supplies.

No fines or sanctions were received for non-compliance with environmental laws and regulations in Papua New Guinea. Mechanisms are in place to enable stakeholders to report any grievances about environmental impacts caused by our operations in both countries.

PERFORMANCE IN FY16

REHABILITATION, LAND MANAGEMENT AND ENVIRONMENTAL CONSERVATION

As custodians of the land we affect and manage, we acknowledge that some aspects of our operations alter the physical landscape permanently. Once mining has come to an end, land must be rehabilitated to assist its appropriate and productive use post-mining. Rehabilitation and closure are incorporated into overall planning from initial concept stage and during the life of mine. This includes ensuring that the necessary funding mechanisms for rehabilitation are in place. We continually identify land for rehabilitation and, where feasible, we refurbish infrastructure for use by local communities. Only a small proportion (14%) of the land covered by our mining rights has been disturbed by mining. Given that much affected land is still in use, opportunities for progressive and concurrent rehabilitation are limited.

Rehabilitation and closure

Land under management (ha)				
	Mining right area	Land disturbed to date	Land rehabilitated	
			FY15	FY16
Kalgold	991	501	0	**0**
Kusasalethu and Deelkraal	5 605	305	5	**0**
Doornkop	905	296	0	**0**
ARMgold shafts (1, 2, 3, 4, 6 and 7)	5 980	351	4	**0.05**
Joel (1 and 2)	2 162	253	0	**0**
Target (1, 2 and 3)	4 327	365	0	**0**
President Steyn South (Steyn 1, 2 and plant)	1 847	41	5	**15.90**
President Steyn North (Steyn 7 and 9)	1 651	193	0	**0.01**
Virginia, Masimong, Saaiplaas, Unisel, Merriespruit, Harmony and Brand	22 583	3 374	1	**4.82**
Bambanani, Joint Metallurgical Services, Harmony One plant	2 356	1 345	66	**0**
Eland, Kudu, Sable, Nyala, Tshepong, Phakisa, Western Holdings 5	10 799	1 581	0	**0.36**
St Helena 2, 4, and 8	4 912	444	0	**1.39**
St Helena 10	944	8	0	**0**
Papua New Guinea	4 098	533	3	**0**
Total	69 160	9 590	84	**22.53**

South Africa

The programme to rehabilitate decommissioned operations, which began in FY10, aims to reduce our environmental liabilities and eliminate potential safety and health exposures. In the process, we work with provincial authorities to meet local socio-economic imperatives. Site demolition of shafts, plants, defunct workshops and hostels continued in FY16. The total number of shafts (including ventilation shafts) decommissioned and demolished to date is 38. Shaft cavities are filled with inert material and they are capped to prevent, among other things, potential fugitive methane emissions. While drafting of Unisel's closure plan is underway, that for Masimong will begin in FY17.

In FY16, the total rehabilitation liability for our South African operations was R2.18 billion (US$150 million) (FY15: R2.22 billion; US$152 million). This amount is fully funded in advance via trust funds, and insurance and bank guarantees. Our rehabilitation programme has reduced our closure liability by more than R150 million (US$10.3 million) since FY10 and provided procurement opportunities and employment for at least 200 local residents. Our most significant rehabilitation programme is being undertaken in the Free State where our bio-energy project in particular has assisted in reducing our environmental liability and in creating employment.

Following a prefeasibility study and budget approval, implementation of a commercial vegetable and olive agricultural project within mining right rehabilitated land in Welkom is scheduled to begin in September 2016 in the Free State. A similar feasibility study has been completed at the Doornkop operation using treated water to potable water standards. Development of several vegetable hubs in the Welkom area and at Doornkop is due to begin in October 2016. In addition, certain obsolete infrastructure is being re-purposed for use by the community. To this end a memorandum of agreement has been signed with

POPCRU for an academic training precinct to be established in former mine buildings at Harmony 3 shaft while part of the Steyn plant has been repurposed as part of the bio-energy project.

At Kalgold, a novel rehabilitation programme involves the return of tailings to the D-zone pit, which is to be converted into a waste storage facility, thus eliminating the need for a new tailings dam. Approval of the amended environmental management programme is awaited. The deposition of tailings into the pit began in FY15 and has delivered to design of the closure plan. In addition to consolidating the operation's footprint, an added advantage of this rehabilitation strategy is the recirculation of process water to the plant, thus maximising the re-use of affected water.

NOTEWORTHY ACTION

Land rehabilitation and generating bio-energy in Matjhabeng

Good progress was made with our multi-faceted land rehabilitation and rejuvenation programme in Matjhabeng in the Free State in FY16. This R53 million (US$3.7 million) programme involves:

- Rehabilitating land and re-purposing an old gold plant to enable an appropriate, sustainable, post-mining, value-adding use
- Reducing our carbon footprint and thus our effect on climate change
- Creating economic opportunities for local communities once mining ceases by promoting skills development and job creation

In particular this programme includes implementation of a renewable-energy project to generate bio-energy from bio-crops cultivated on rehabilitated land. This energy will help to power our plants and thus contribute to reducing our demand for coal-based electricity.

Bio-energy project

Among options considered for post-mining land use was the rehabilitation of land to cultivate non-edible bio-crops to generate renewable bio-energy, such as biogas and bio-char, for use as a substitute for polyfuel in the Harmony One gold plant.

Bio-crops (giant king grass, sweet sorghum or sugar beet) are being propagated to generate bio-energy (natural gas as a substitute for fossil-fuelled energy). Giant king grass is being used as the primary bio-crop feedstock owing to its high energy yields and its resilience to mine-impacted land. Giant king grass also provides the best yield of biomass per hectare.

The bio-energy generated will power the Harmony One gold plant elution and carbon regeneration circuits. The electrical and polyfuel water heating methods in the elution process have been converted to bio-gas heating. Phase 1 of the project is set to deliver 71 000GJ of energy. The project will ramp up to generate 187 000GJ within 24 months.

Additional benefits of the project include skills development and job creation for communities as well as a sustainable legacy for the Free State. The bio-char will also be used as a source of fuel by the communities.

Implementation of phase 1 of the project began in September 2014. This entailed establishing a pilot plant to generate and deliver 1.5MW equivalent of energy, and involved the refurbishment of Harmony's existing Steyn gold processing plant for use as a biogas plant. Following its commissioning, the plant is scheduled to begin producing first gas by August 2016. Full-scale production is expected in September 2016. Once the plant is fully operational and the concept has been proven, phase 2, which will involve a ramp up to 5MW equivalent of energy, at a cost of about R100-million, will begin implementation.

In the initial pilot project, 100ha of mine-impacted land was used for crop cultivation and an additional 250ha of land will be planted for the phase 2 ramp-up.

The 1.5MW equivalent plant will enable Harmony to offset about 8 000t CO_2 annually, while the 5MW equivalent plant will allow the annual offset of 27 000t CO_2.

Papua New Guinea

Land clearing for mining and processing operations is closely managed by the environment and community affairs departments. Staff are specially trained in the use of equipment for the rehabilitation of cleared surfaces, which is challenging given the rugged terrain and high rainfall. In addition, Hidden Valley and Golpu are in a geologically active zone, which experiences frequent earthquakes and landslides.

Biodiversity, land management and conservation

Relevant Global Reporting Initiative indicators: G4-EN12, G4-EN14, G4-EN31, MM1, MM2

Biodiversity management plans are implemented at all sites, through either their respective mine closure plans, environmental management plans or through specific biodiversity action plans.

In the Free State, a nursery has been established to cultivate species to revegetate affected or remediated land. Harmony is currently rehabilitating disturbed land within our mining rights.

The following conservation projects continued in FY16:

South Africa

Flamingo conservation project: Harmony entered into a partnership with BirdLife South Africa to develop and design conservation measures to protect the Lesser Flamingo's habitat in the district of Welkom, in the Free State. In consultation with key stakeholders, a survey was conducted by BirdLife South Africa to ascertain which pans in the area could potentially assist with conserving the near-threatened species, whose population is declining at an alarming pace. The Voelpan, opposite the Target shaft, has been identified as being the most suitable. The survey report recommends building a breeding island in the middle of the pan to allow safe breeding. This project, which is also being conducted in partnership with the Department of Tourism, is scheduled to be completed by end December 2017. BirdLife South Africa will be engaging with the relevant stakeholders regarding implementation. The total cost of this project is approximately R0.1 million (US$48 000).

Avianator programme: We funded courses presented by BirdLife South Africa to teach young people about the value of birds and their habitats. In FY16, a total of 14 schools participated in these courses in Thabong, Welkom, Virginia, Winburg and Hoopstad in the Free State. Since inception in FY13, Harmony has contributed R0.5 million (US$0.4 million) to this programme.

Papua New Guinea

Although Hidden Valley is not in a biodiversity-protected area, five species on the International Union for Conservation of Nature Red Data List occur in the vicinity of the mine. There is no evidence that the mine has affected these critical habitats. The five species are two types of tree kangaroos, nectar bats, harpy eagles and long-beaked echidna. These species are not endemic to the Hidden Valley area.

Key measures proposed for the Golpu project's environmental management plan to manage impacts on terrestrial ecology include:

- Development and implementation of procedures to limit the impacts of vegetation clearing
- Salvage of seedlings of vulnerable flora species for rehabilitation
- Weed and pest control management measures

ENERGY MANAGEMENT – OPTIMISING OUR ENERGY USE, REDUCING OUR CARBON EMISSIONS

Relevant Global Reporting Initiative indicators: G4-EN3, G4-EN5 and G4-EN6

Harmony's energy management is based on our energy efficiency and climate change policy and strategy which are driven by the need to reduce energy consumption and greenhouse gas emissions, to adapt to climate change and to diversify the energy mix. In particular this includes:

- promoting energy efficiency at our deep-level mines in South Africa
- designing and developing renewable energy sources in Papua New Guinea
- optimising and rebalancing our asset portfolio
- promoting an alternative energy mix
- aligning our rehabilitation programme with the green energy agenda

In FY16, Harmony's total energy use was 2 597 439MWh (FY15: 2 667 375MWh), down by 2.6%, with corresponding energy intensity levels of 0.13 MWh/tonne treated (FY15: 0.15MWh/tonne). In all, our energy consumption has declined by 15% in the past five years and our intensity usage by 31.6%, which has in turn reduced our greenhouse gas emissions.

Energy consumption is a significant portion of our operating costs in South Africa (16% including capital costs; FY15: 16%) but somewhat less so in Papua New Guinea (12%; FY15: 8%).

South Africa

We mostly consume indirect energy in the form of electricity purchased from the national power utility, Eskom, which is generated by coal-fired power stations with very little scope for large-scale purchases of energy from renewable sources. Electricity tariffs have risen steadily since 2008 and, given electricity's relatively significant contribution to operating costs, tariff increases exceeding 8% will impact the sustainability of our operations. Reducing consumption is thus essential.

Energy efficiency initiatives focus on efficient mine cooling, compressed air, water management and ventilation as well as an improved energy mix with an emphasis on sustainable renewable energy – especially solar power, hydropower and bio-energy in the short term. We have improved our internal solar power generating capacity, which has helped to decrease power consumption and energy-use intensity. By the end of FY16, 11 (FY15: 12) solar energy projects had been implemented. These continue and are expected to realise a total combined annual energy saving of 64 040MWh. Some of these projects are energy neutral (load shifting projects) and hence contribute to cost savings only.The performance of the energy-efficient fans installed underground at Kusasalethu is exceeding expectations. (See noteworthy actions)

Our fleet-optimisation initiative has contributed to a reduced carbon footprint by reducing the fossil fuels (petrol/diesel) consumed in transporting people and material. We now use fewer vehicles and monitor fuel consumption monthly in line with key performance indicator measurements. We also limit the average age of the vehicles in our fleet and thus reduce emissions as there is a direct correlation between fleet age, kilometres travelled, oil consumption and maintenance costs.

Papua New Guinea

Emission intensities are much lower because operations here are designed for energy efficiency and a predominantly renewable energy base. Hidden Valley has been driven predominantly by hydro-power since 2011 – 75% in FY16 (FY15: 83%). The decline in the proportion of hydro-power in FY16 was due to water shortages for hydro-power production owing to drought and generating capacity maintenance issues with the Hidden Valley power provider. In FY16, 14 000MWh of diesel-generated electricity was consumed (FY15: 10 355MWh).

Direct and indirect energy consumption (MWh)						
	FY16	% of total energy used	FY15	% of total energy used	FY14	% of total energy used
South Africa						
Direct [1]	**–**	–	–	–	–	–
Indirect [2]	**2 542 463**	100	2 608 157	100	2 756 029	100
Total	**2 542 463**	100	2 608 157	100	2 756 029	100
Papua New Guinea						
Direct [1]	**14 010**	25.5	10 355	17	18 354	30
Indirect [3]	**40 966**	74.5	48 863	83	42 060	70
Total	**54 976**	100	59 218	100	60 414	100
Harmony						
Direct	**14 010**	0.54	10 355	0.39	18 354	1
Indirect	**2 583 429**	99.46	2 657 020	99.61	2 798 089	99
Total	**2 597 439**	100	2 667 375	100	2 816 443	100

[1] *Diesel*
[2] *Non-renewable: coal-fired power stations (Eskom)*
[3] *Renewable energy: hydropower-generated electricity*

Energy consumption and intensity (MWh)					
	FY16	FY15	FY14	FY13	FY12
South Africa	**2 542 463**	2 608 157	2 756 029	2 664 111	3 013 150
Papua New Guinea	**54 976**	59 218	60 414	51 414	50 312
Total	**2 597 439**	2 667 375	2 816 443	2 704 220	3 058 219
Intensity consumption (MWh/tonne treated)	**0.13**	0.15	0.15	0.14	0.19

Addressing climate change by optimising our energy use

Relevant Global Reporting Initiative indicators: G4-EC2

Climate change risks have influenced the design of new assets and the operation of current assets in terms of energy efficiency and the use of alternative energy sources. Opportunities and risks presented by climate change are included in mine closure plans, monitored continuously and communicated to the board throughout the year. The overall strategy is reviewed annually. Our intention is to substitute up to 50% of conventional electricity usage (fossil fuel, grid energy) with renewable energy. We are preparing power purchase agreements for three 10MW solar facilities and have begun implementing the first phase of our bio-energy programme.

Harmony's short-term strategy (for the next five years) is driven by adaptation, conservation and a move towards an alternative energy supply mix. We are reducing our grid-electricity consumption and greenhouse gas emissions by targeted year-on-year and multi-year reductions. To this end, we have implemented a suite of energy efficiency initiatives and closed carbon-intensive (high-energy) shafts. We are set to increase the use of green energy derived from hydro-power, solar power and biomass.

Our long-term strategy to mitigate the risk of climate change is based on two elements:

- **Rebalancing our asset portfolio:** Energy-intensive operations are being closed and we will focus on developing lower carbon-intensity assets to minimise the impact of higher energy costs and potential exposure to carbon tax. For example, the restructuring of Kusasalethu enabled us to reconfigure that operation to ensure that natural resources are used most optimally, delivering both water and energy savings in support of the mine's long-term sustainability.
- **Post-mining land use:** Among options considered for post-mining land use are the creation of carbon sinks and the use of rehabilitated land to cultivate non-edible crops to generate renewable bio-energy.

NOTEWORTHY ACTIONS

South Africa: optimising energy consumption, reducing costs, supporting national targets, committed to renewable energy

Having met the South African government's national energy-efficiency improvement target of 12% by 2015, we continue to work closely with Eskom to manage our electricity usage. This co-operation has included implementing demand-side management strategies to reduce electricity consumption during peak periods. For example, the scheduling of pumping, air compression, cooling, hoisting and ventilation to coincide with less expensive off-peak periods, allows us to make more efficient use of Eskom tariffs that reward load shifting and load clipping, and to improve operational efficiencies.

By the end of FY16, four demand-side management and seven Harmony-funded projects had been implemented. Eleven additional initiatives identified are in various stages of investigation or implementation. Together these projects will result in a total annual energy saving of 56 000MWh. Harmony has entered into a service level agreement with an electricity supply company to review our energy usage and recommend energy efficiency projects for all operations, to ensure that targeted energy savings are achieved for the next two years. Initiatives undertaken by the operations, such as temporarily halting compressors, winder, refrigeration plants, pumps and main ventilation fans, are achieving planned energy savings. Some of these are carbon neutral and will contribute to cost savings. The underground ventilation fans project from the previous year (funding provided by Harmony was used for the stope isolation valve project – turning off water and compressed air during periods when no mining activity is taking place) will be re-implemented this year to achieve planned energy savings. These initiatives are sustainable in the long term.

In line with the National Energy Regulator of South Africa's renewable energy feed-in tariff guideline, Harmony continues to assess various energy-generating initiatives. In addition to the bio-energy project, the following initiatives are also underway:

Solar power: We are collaborating with industry partners to develop a 10-15MW solar park at Kalgold, as well as three 10MW photovoltaic plants in the Free State. Harmony is currently working on a power purchase agreement and tariff structure which will be used in the agreement between Harmony and project developers. The environmental impact assessments for all four sites have been approved. Energy is expected to be generated from all of these sources by end June 2017.

Power-generating turbines: At Kusasalethu, three 3.1MW power-generating turbines were commissioned in FY15. These turbines generate power from surface mine water transported underground. The targeted power generation capacity has been reduced as less water is now being consumed by the mine. The annual cost saving is estimated at R6 million (US$0.4 million. While we continue to monitor the debate on carbon offsets and trading in order to identify opportunities, this initiative has yet to be registered as a carbon project.

Installing energy-efficient fans: Our underground operations use 45kW fans to supply fresh air to the mining areas. The aim of this project is to install and replace these with energy-efficient fans that will deliver the same pressure and flow using less power. These energy-efficient fans are being installed at Doornkop, Target, Tshepong, Phaskisa, Bambanani, Masimong and Joel.

Management of energy usage: A specialised energy management system is being used to manage energy usage patterns at Kusasalethu's and Doornkop's plant mills and shaft winders. Mill and winder usage will be prioritised for off-peak periods to reduce electricity costs and decrease the load during national high-demand periods. Similarly, the same system will be used to manage energy usage by the bulk air coolers at Tshepong and Unisel, primarily during national peak periods. Underground temperatures are monitored to ensure these is no adverse impact on mining conditions.

Compressed air: Following preliminary indications that there is potential for energy savings from compressed air management, more detailed investigations are underway at Tshepong, Bambanani and Unisel to determine if savings are possible by optimising compressed air usage by matching compressed air supply with actual demand.

Other initiatives: Various other energy management initiatives are being considered to reduce the energy load during peak periods. These involve managing energy usage by the water pumps and by the underground refrigeration machines. During off-peak periods, water will be pumped to surface at Unisel and it will be chilled and stored in a chill dam at Kusasalethu so that the refrigeration plant does not run during peak periods.

Surface fans: An initiative is underway to determine if the use of surface fans on our gold mines can be optimised. The initiative will ensure that optimal ventilation conditions are maintained while reducing electricity consumption.

NOTEWORTHY ACTIONS

Papua New Guinea: reduce reliance on diesel-generated power, lower fuel consumption, increase hydropower use

- A greenhouse gas management strategy has been developed for our joint venture Papua New Guinea operations where the main source of power is hydropower (Scope 2), which does not generate greenhouse gas emissions.
- We aim to reduce our reliance on diesel-generated power at Hidden Valley and the amount of fuel trucked to this remote site. The lower proportion of hydropower in FY16 (~75%) was in part due to water shortages for hydropower production due to prevailing El Nino conditions and generating capacity maintenance issues with the Hidden Valley power provider. The Hidden Valley process plant, which accounts for the vast majority (about 85%) of the power consumed at this operation, is equipped with the latest technology to ensure optimal energy use.
- The Golpu project will be designed to meet environmental best practice and incorporate Papua New Guinean statutory requirements and, where applicable, alignment with Australian, World Health Organization and International Finance Corporation (part of the World Bank) standards or guidelines. The feasibility study infrastructure designs have been developed with energy efficiency in mind. Power studies for the Golpu project have included potential for the use of hydropower, coal, natural gas or biomass for power generation. The selected power supply option for the feasibility study assumed power would be sourced from the national grid. Diesel generators to be used during construction will remain on site as emergency power supply during operations.

Climate change and greenhouse gas emissions

Relevant Global Reporting Initiative indicators: G4-EC4, G4-EN15, G4-EN16, G4-EN17, G4-EN18 and G4-EN19

Harmony's Scope 1 and Scope 2 emissions in FY16 totalled 2 636 493t CO_2e (FY15: 2 753 303t CO_2e) with a corresponding intensity of 0.145t CO_2e/tonne milled (FY15: 0.15t CO_2e/tonne milled). Indirect emissions, largely due to electricity purchased from Eskom, accounted for 97.9% of emissions. In FY16, we decreased our Scope 1 and Scope 2 emissions by 4% (FY15: 2%).

In FY16, our total carbon emissions decreased by 5.5% (FY15: 1.2%) with a corresponding decrease in intensity, which averaged 0.179t CO_2e/tonne treated for the year (FY15: 0.191t CO_2e/tonne treated). Group-level absolute and intensity-based greenhouse gas emission reduction targets have been set for the five years to FY18 (see Outlook on page 77).

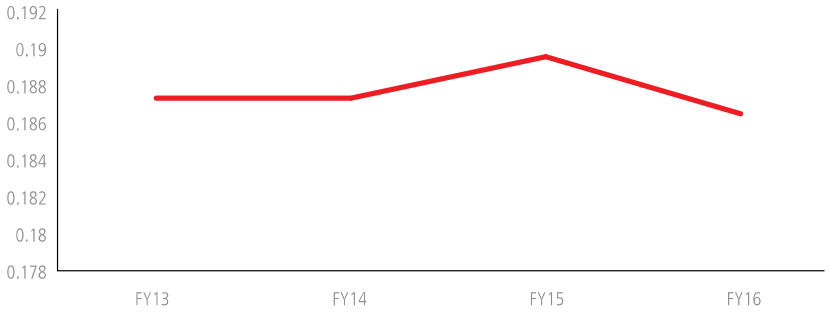
Group carbon emissions				
	FY16	FY15	FY14	FY13
Scope 1 emissions breakdown by source (CO_2e tonnes)				
Diesel	**53 278**	64 244	71 728	90 951
Explosives	**1 838**	1 748	2 079	2 026
Petrol	**777**	909	950	1 337
Total	**55 893**	66 902	74 758	94 314
Scope 1 emissions breakdown by source (%)				
Diesel	**95.3**	96	96	96
Explosives	**3.3**	3	3	3
Petrol	**1.4**	1	1	1
Total	**100**	100	100	100
Total scope 1, 2 and 3 emissions (CO_2e tonnes)				
Scope 1	**55 893**	66 902	74 758	94 314
Scope 2	**2 580 600**	2 686 401	2 745 005	2 648 126
Scope 3	**615 456**	686 233	661 515	616 978
Total	**3 251 949**	3 439 536	3 481 278	3 359 418
Total scope 1, 2 and 3 emissions (%)				
Scope 1	**2**	2	2	3
Scope 2	**79**	78	80	79
Scope 3	**19**	20	18	18
Total	**100**	100	100	100

Carbon emissions intensity				
	FY16	FY15	FY14	FY13
Scope 1 emissions intensity by source (CO_2e tonnes/tonne treated)				
Diesel	**0.0029**	0.0036	0.0038	0.0051
Explosives	**0.0001**	0.0001	0.0001	0.0002
Petrol	**0.0001**	0.0001	0.0001	0.0001

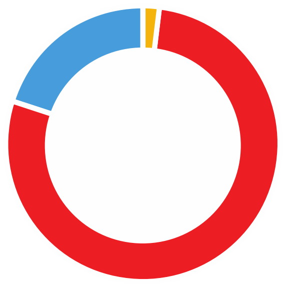
Total scope 1, 2 and 3 emissions intensity (CO_2e tonnes/tonne treated)				
Scope 1	**0.0031**	0.0040	0.0040	0.0051
Scope 2	**0.1428**	0.1490	0.1458	0.1441
Scope 3	**0.0340**	0.0380	0.0332	0.0336
Total	**0.1799**	0.1910	0.1830	0.1828

Annual carbon emissions intensity

(CO_2e tonnes/tonne treated)



CO_2 emmissions by scope (%)



NOTEWORTHY ACTION

Engagement with suppliers and their environmental impacts

Relevant Global Reporting Initiative indicators: G4-12, G4-EN32, G4-EN33, G4-HR11

We manage our supply chain risk by engaging continuously with our top 50 suppliers to reduce their greenhouse gas emissions and climate change risks across the value chain.

While environmental management and compliance with various legislation and regulations, among others, are included in the general conditions of contract for suppliers, screening of suppliers has yet to be undertaken. Should a supplier be found to be in contravention or to be non-complaint, our contracts with them will be suspended. To date, there have been no such suspensions, and we have not received any reports of grievances against suppliers regarding adverse environmental impacts. A more specific greenhouse gas-related clause is to be included in future contracts. This clause will state that all suppliers must agree to introduce a greenhouse gas reporting system for the products we purchase and to submit an annual report on their carbon footprint to Harmony. Working with suppliers to improve their greenhouse gas performance will help reduce our Scope 3 emissions over time.

Harmony's supply chain has made great strides in managing its own environmental footprint. Various initiatives have reduced fuel consumption by approximately 29% in the past five years.

Climate change and water reporting

Just prior to year-end, we submitted our eleventh annual responses to the Carbon Disclosure Project for climate change and water.

Results from our previous submission – released in November 2015 – indicated that we were on both global A performance lists:

- **Climate change:** Harmony was one of five South African companies on the global climate change performance A list. There were 113 companies in all on the A list
- **Water:** Harmony was one of only eight companies globally to be awarded an A grade for water security and water management – and one of two South African companies

These awards acknowledge our performance in managing our power consumption and related emissions, and our water usage.

OPTIMISING WATER USE, LIMITING OUR IMPACTS

Relevant Global Reporting Initiative indicators: G4-EN8, G4-EN9 and G4-EN10

Our water strategy supports the drive for self-generation and zero discharge to underscore our water conservation and demand management objectives. We have also begun an intensive exercise to optimise the supply of regional water in Welkom, so as to ensure that we have a sufficient supply in the event of a protracted drought and that we use water responsibly. In addition, our intention is to secure a sufficient supply of water for business growth and development, as well as for social upliftment initiatives.

Water use – measured

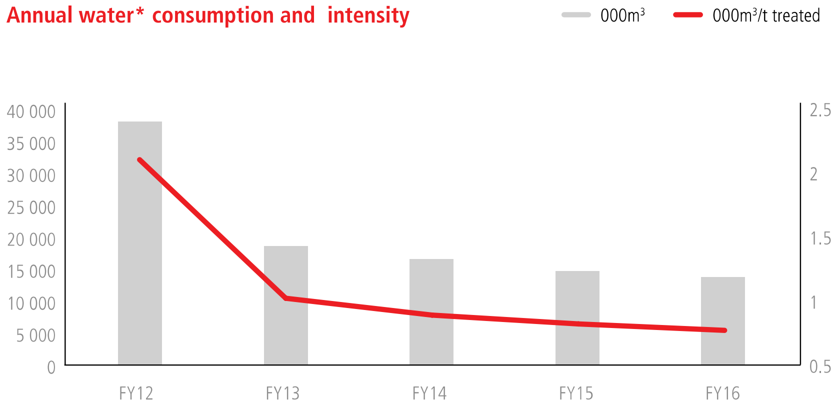
		FY16	FY15	FY14	FY13[1]	FY12
Water used for primary activities	000m^3	[2]**13 689**	14 614	16 495	18 556	38 011
Potable water from external sources	000m^3	**12 459**	11 993	13 139	15 610	15 519
Non-potable water from external sources	000m^3	**1 230**	2 620	3 355	2 946	22 492
Surface water used	000m^3	**716**	776	1037	1 230	1 023
Groundwater used	000m^3	[3]**513**	1 844	1 550	1 716	21 469
Water recycled in process	000m^3	**38 821**	38 338	24 531	27 593	38 337
Percentage of water recycled	%	**74**	72	61	60	50

[1] FY13 excludes Evander – some reductions occurred in the previous year
[2] Decrease in water used for primary activities due to Kalgold's being less dependent on water from external sources and increasing its usage of recycled water
[3] Decrease in groundwater used due to reduced dependency on groundwater by Kalgold as a result of its increased use of recycled water in the process

Water used for primary activities – measured

		FY16	FY15	FY14	FY13*	FY12
Intensity consumption	000m^3/tonne treated	**0.76**	0.81	0.88	1.01	2.09
Water used for primary activities	000m^3	**13 689**	14 614	16 495	18 556	38 011

Annual water* consumption and intensity



** Water used for primary activities*

The total amount of water used for primary activities declined to 13 689m³ in FY16 with an intensity of 0.76m³/tonne treated (FY15: 14 613 602m³ and intensity of 0.81m³/tonne treated).

Harmony has implemented a group-wide campaign to re-use process water and thus reduce our dependency on groundwater by 4.5%, while increasing the amount of water recycled by 5%, by FY18.

South Africa

In line with legislative requirements, integrated water-use licence applications were submitted to the authorities for each operation in 2006. At year-end FY16, the status was as follows:

- Kusasalethu's water use licence issued
- Doornkop is awaiting a final licence. The Department of Water and Sanitation has confirmed that the old order mining right is valid until the regulator's backlog is resolved
- Final approval is awaited for Kalgold's water licence
- Applications for water use licences for the Free State region were submitted to the national office with a recommendation from the regional office to issue all the Free State licences applied for

Intermittent water supplies pose a significant threat to our operational continuity and profitability. A strategy to reduce dependency on potable water and to maximise our use of fissure and process water began in 2013.

To aid water conservation, a water treatment plant was installed at Kusasalethu to eliminate any discharge into the receiving environment. In addition to preventing pollution of the instream water environment, these plants will help maximise the reuse and recycling of mine water. This will reduce dependency on Rand Water and free up this scarce resource for use by others. A similar plant has been budgeted for and will be constructed before year end at Doornkop.

Kusasalethu: Desilting of water dams together with enhanced pumping capabilities, on surface and underground, increased holding capacities enabling the dams to accommodate greater volumes as per design. This has helped eliminate overflows and reduced the level of solids in process water. Pumps now last longer and there are fewer breakdowns, which eliminates the risk of flooding of underground workings.

Kalgold: Plant and tailings storage facilities were modified to maximise the recovery of water for reuse. The process water dams were reinforced to increase storage capacity and minimise overflows, and more efficient flow meters and valves were installed. Comparisons of water consumption and recovery in FY15 and FY16 indicated:

- an increase of more than100% in the average quantity of water recycled (FY15: 43 547m³ compared with FY16: 112 706m³)
- 99.3% reduction in surface water sourced (7 306m³ in FY15 compared with 1 000m³ in FY16)
- 74% reduction in volume of groundwater abstracted (125 436m³ in FY15 compared with 32 959m³ in FY16).

Kalgold is our only South African operation to draw water directly from a surface source aquifer. Other operations are supplied by bulk water service providers and municipalities, surface water run-off, water pumped to surface from underground operations, recycled water and borehole water.

Doornkop: Capacity management and water efficiency have been optimised and all industrial and process water used at shaft and by the plant comes from underground workings/dams, eliminating any demand for water from Rand Water. The process water dam has a gross capacity of 1 600 000m^3 and provides Doornkop plant with adequate water storage capacity for its needs. The dam is equipped with a spill way chute in case of overflows. With the drought in the summer of 2015/2016, water was drawn from the shaft to fill up the dam to ensure that the plant did not use potable water for processing. Every effort was made to minimise water losses and process water recycling levels increased from 164 894m^3 for FY15 to 869 016m^3 for FY16. All process water at plant is sourced from shaft boreholes and fissure water. This water is re-used at the plant and circulated and diluted with fissure water to improve the quality of the water in the dam where a variety of birds nest. At the shaft, small reverse osmosis plants treat water and supply underground employees with fresh, clean water for drinking which reduces shaft consumption of Rand Water. A 5ML reverse osmosis and ion exchange plant under construction on surface will treat mine water for operational use, taking the operation to zero discharge.

NOTEWORTHY ACTION

Harmony has committed R2 million to provide potable water to drought-affected communities in Matjhabeng. Boreholes have been drilled in Theunissen in the Free State province.

Papua New Guinea

At Hidden Valley, the steep topography, high rainfall and low levels of evaporation pose significant water management challenges. Two main water management techniques in use are:

- controlled run-off of rainfall to prevent erosion and sediment entering the river system
- conservation of site water used to limit the volumes of treated wastewater that need to be discharged to the environment.

Most of the raw water required by Hidden Valley is drawn from Pihema Creek and used in the process plant and related ore-processing activities. Although process water recycling is prioritised, the tropical environment creates a positive water balance thus, together with the requirement to minimise water storage in the tailings storage facility, there is a high rate of water discharge to the environment.

The Hidden Valley operation treats all water to prescribed standards before it is discharged into the environment and the joint venture partners continuously monitor and manage the environmental impact of the mine on the Watut River system. The environment and mine operational teams at Hidden Valley meet on a quarterly basis with representatives of Harmony and Newcrest Mining Limited to review waste dump design, compliance of the tailings storage facility and water discharge results. Quality assurance/control programmes have been implemented to monitor construction of the waste dump and tailings storage facility, including assessment of sediment and run-off control measures.

Discharge of mine-related sediment into the Watut River has been reduced with a continued focus on erosion control and sediment management. Lime dosing of the Watut River continues when required to control acidity and dissolved metal levels. At the sewage treatment plant, continuing operator training has improved compliance with permitted discharge criteria.

Acid mine drainage

Major sources of acid mine drainage include drainage from underground mine shafts and run-off and discharge from open pits and mine waste dumps, tailings and ore stockpiles. Tailings and ore stockpiles make up nearly 88% of all waste produced at our South African operations.

Our water management strategy involves intercepting water before it is polluted underground. When there is a risk that rising water levels underground could hinder access to our ore reserves or those of other operations or harm the environment, water is pumped to surface. It is then consumed as plant intake.

At Doornkop, water is discharged under directive. Its water licensing is currently underway and the mine complies with the terms of its draft licence. An intensive water-monitoring programme is in place and reporting to the regulator takes place routinely. Doornkop also has a directive to discharge 1.5Ml of fissure water into the receiving stream which has been exceeded during construction of the water treatment plant, although the discharge did comply with instream water quality requirements. The plant, which is scheduled for completion by year-end will enable us to get to zero disharge.

Regarding surface water pollution, rehabilitation has been prioritised at the joint metallurgical scheme and acid plant sites in the Free State, and at the decommissioned shafts and associated infrastructure in the Free State and at Kusasalethu.

In terms of its water licence, Kusasalethu is authorised to discharge 1.5Ml per day on condition that the discharge meets certain set water-quality criteria. Kusasalethu has on occasion exercised this right but only under extreme conditions. Such discharges will be eliminated as the water treatment plant was fully operational by year-end.

In Papua New Guinea, acid mine drainage occurs as a result of waste rock dumps that contain potentially acid-forming material. Environmental impacts are mitigated by the construction of engineered waste rock dumps and controlled placement of potentially acid-forming waste rock. When required, lime is added to the process-water discharge to maintain natural levels of alkalinity at the compliance point. Water sampling and studies continue to improve our understanding of acid mine drainage impacts and enable us to formulate plans for longer-term reduction and mitigation.

OPTIMISING OUR USE OF MATERIALS

Relevant Global Reporting Initiative indicators: G4-EN1

The primary materials consumed in the conduct of our mining activities and processes include the rock (ore and waste) we mine together with liquefied petroleum gas, grease, cyanide, fuels and lubricating and hydraulic oils.

Materials used

	FY16	FY15	FY14	FY134	FY12
Rock mined: ore and waste (000t)	**27 606**	[1]29 948	39 133	38 668	34 868
Ore mined (000t)	**19 739**	13 041	14 798	13 312	14 010
Waste rock recycled (000t)	**3 964**	6 647	7 058	8 008	8 191
Slimes recycled (000t)	**6 131**	5 987	5 933	5 358	6 955
Liquefied petroleum gas (t)	**0.54**	1.14	1.21	1.08	0.55
Grease (t)	**[5]384**	54	87	61	51
Cyanide (000t)	**[6]18.0**	14.3	14.7	8.0	11.1
Petrol and diesel (000ℓ)	**20 298**	24 464	[2] 27 148	[3] 61 354	30 135
Lubricating and hydraulic oil (000ℓ)	**2 291**	2 772	3 011	3 860	2 457

[1] Reduction mainly due to closure of Target 3 and restructuring of Kusasalethu's production profile
[2] Reduction in petrol and diesel consumption due to closing Kimberley Reef area at Doornkop and decline in consumption at Hidden Valley with increased use of hydropower
[3] Increased use at Hidden Valley when overland conveyor malfunctioned
[4] Excludes Evander (previous years not restated)
[5] Increased usage at Phakisa and Tshepong
[6] Increase in cyanide consumption due to high usage at Kalgold when milling oxides

Cyanide

Harmony used 18 000t of cyanide during FY16 (FY15: 14 300t). The increase in cyanide consumption was largely due to the increased volume of tonnes treated in FY16 –18.1Mt compared to 18.9Mt in FY15. The corresponding intensity usage is 0.97t cyanide/t treated for FY16 (FY15: 0.79t cyanide/t treated).

Harmony is a signatory to the International Cyanide Management Code for the manufacture, transport and use of cyanide in the production of gold (the Cyanide Code). All of our major gold mining operations and most of our metallurgical plants have been certified compliant with the Cyanide Code.

Kalgold: The cyanide detox plant was commissioned in July 2015 when the Kalgold plant began to deposit tailings into the D-Zone open pit as part of Kalgold's open pit closure strategy. The cyanide detox plant will reduce cyanide concentrations in the tailings to acceptable levels. Test work is underway to ensure we achieve the desired levels. Cyanide concentration levels are monitored at the detox plant, along the tailings and return water pipeline route and at the point of discharge into the pit. The Kalgold plant is to re-register with the International Cyanide Management Institute once cyanide concentrations meet the institute's requirements.

Phoenix retreatment operation (Saaiplaas plant): The de-registration status quo remains. The plant's process does not allow for decreases in cyanide dosages as this results in reduced gold recovery and we are therefore unable to reduce the weak acid dissociable concentration of cyanide leaving the plant.

Hidden Valley's plant received its Cyanide Code compliance certificate in FY14. Harmony and Newcrest are signatories to the code and, since commissioning of the process plant in FY10, cyanide concentrations at the Nauti Village compliance point (as stipulated in the permit) comply with the environmental permit limits.

MANAGING OUR EFFLUENTS AND WASTE

Relevant Global Reporting Initiative indicators: G4-EN22, G4-EN23, G4-EN24 and MM3

Effective waste management is a priority and can reduce our environmental impacts and mitigate our environmental liabilities. An understanding of the actual cost of waste management enables us to plan effectively for new projects and mine closure. Practically, we maximise recycling and waste reduction during the life of a mine, and design to minimise waste and reclaim mineral waste (such as waste rock from dumps as aggregate) to curtail our total mining environmental footprint.

Internally, guidelines on mineral, non-mineral and hazardous waste materials are included in the environmental management systems implemented at all operations. We understand that waste management begins with initial generation and encompasses handling, storage and transport as well as recycling, treatment and/or disposal.

Waste (000t)					
	FY16	FY15	FY14	FY13	FY12[1]
Accumulated tailings in tailings storage facilities (active and dormant)	**1 418 577**	1 400 273	1 382 178	1 359 770	1 433 760
Accumulated waste rock dumps	**203 559**	196 692	190 128	169 115	165 085
Scrap steel	**6.229**	4.996	4.919	5.583	10.355

[1] *New reporting indicator for South Africa from FY12 onwards with consolidated group data reported*

Mineral waste

In FY16, 26.1Mt of mineral waste was generated from gold production (FY15: 24.7Mt), comprising 7.9Mt (FY15: 6.6Mt) of waste rock and 18.3Mt of tailings (FY15: 18.1Mt).

Tailings comprise crushed rock and process water emitted from the gold elution process in the form of a slurry once the gold has been extracted. The composition, size and consistency of tailings vary by operation with opencast operations producing greater volumes in general than underground operations.

Tailings and waste rock are usually inert but rock close to the ore body may be associated with radiation or salts if these are characteristic of the ore body.

As tailings contain impurities or pollutants, they are placed on tailings dams engineered to contain the slime, in line with our water management programme. The fines are also collected and deposited on the tailings. Water is collected from toe drains and penstocks, and channelled to return water dams where it is available for reuse by the plant.

In the process, cyanide is destroyed – it self-destructs on the tailings when exposed to light – but salts and heavy metals can enter groundwater and create a pollution plume. We monitor our groundwater as public safety assessments have found that these plumes (radionuclide contaminant plumes) could be contained in the tailings storage or water management facilities for hundreds to thousands of years.

Effective mineral waste management reduces the aesthetic and land use challenges of mining, particularly during closure, as well as the potential for water and air pollution while maximising the recovery of ore, minerals and metals. Improved mineral waste management can result in significant savings and a reduction in energy consumption. Residual economic value can be generated from projects such as our Phoenix reclamation initiative.

To protect employees, communities and the environment, we handle all chemically reactive or radioactive waste appropriately by:

- minimising the quantity of material stored to limit the extent of the footprint of land disturbed
- ensuring storage sites are physically and chemically safe, and well-engineered
- undertaking progressive rehabilitation – returning affected land to productive use after mining.

Hidden Valley's advanced waste management systems have generated positive feedback from stakeholders, particularly the tailings storage facility (the first to be operated successfully in Papua New Guinea). The review of laws relating to management and disposal of tailings is now on hold indefinitely while the Mining Policy and Geohazard Department focuses on completing the revised Mining Policy Act and related new regulations approved in 2015. The Mining Policy Act review is in its final stages of approval by the government and may become law during FY17.

Of note, at Hidden Valley, we have:

- improved waste management, closure and decommissioning procedures for waste and fuel oil storage areas
- developed a sediment reduction plan that focuses on source control (for example, better drainage around waste dumps and the stabilisation of exposed slopes) rather than downstream sediment traps. Sediment reduction is still the key focus for the environment team
- discussed with the Conservation and Environment Protection Authority on how alternative and more site-specific discharge criteria for cobalt and sediment can be developed. There has been no progress to date as the Conservation and Environment Protection Authority is focused on their transition activities.
- trained sewage treatment plant operators to ensure that consistent treatment and proper sampling procedures are followed. Compliance has improved.

No application for a permit amendment for Hidden Valley has been made. The focus has been on having the Environmental Improvement Plan accepted by the authorities before negotiating new environmental permit conditions.

Non-mineral waste

In FY16, 11 895t of waste (plastic, steel, wood and paper) were recycled (FY15: 9 059 tonnes), generating R6 million (US$0.4 million) (FY15: R5 million; US$0.4 million).

Plastics, steel, paper and timber generated by processing operations are produced in smaller volumes than mineral waste. This non-mineral waste is managed by recycling/re-use, off-site treatments, disposal or on-site landfills. We ensure responsible storage, treatment and disposal of non-mineral waste. Group environmental standards for non-mineral waste management are integrated into existing ISO 14001 systems.

OUTLOOK

We continue to pursue our five-year environmental objectives:

Group aggregate targets FY14-FY18			
	Baseline data	Performance	
		FY16	FY15
Baseline FY13			
Reduce water used for primary activities (intensity and absolute) by 4.5%	Absolute: 18 556ML Intensity: $1.01m^3/t$	Absolute: 13 689ML Intensity: $0.76m^3/t$	Absolute: 14 614ML Intensity: $0.81m^3/t$
Total environmental legal compliance	0 fines	0 fines	1 fine
Improve percentage of water recycled (intensity and absolute) by 5%	60%	73%	72%
Implement 80% of biodiversity action plans	All South African operations have biodiversity action plans in place		
Reduce land available for rehabilitation by 2%	9 948ha	9 057ha	9 454ha
Baseline FY08			
Reduce absolute electricity consumption by 3%	4 422 000MWh	2 439 597	2 667 375MWh
Reduce intensity of electricity consumption by 2%	0.35MWh/t	0.13MWh/t	0.15MWh/t
Reduce total carbon emissions by 3%	5 343 000 t CO_2e	3 251 949 t CO_2e	3 439 536t CO_2e
Reduce carbon emission intensity by 2%	0.3t CO_2e/t	0.179 t CO_2e	0.19t CO_2e/t

MINING CHARTER COMPLIANCE SCORECARD

Harmony is a truly empowered company and we report on our performance in relation to the Mining Charter throughout this integrated report. The table below sets out our performance in relation to the specific requirements of the Mining Charter, as gazetted in 2010, and our progress in terms of the targets it set for 2014.

A revised draft of the Mining Charter was published in April 2016 and Harmony, through the Chamber of Mines, is currently engaging with government on the content of the proposed Mining Charter, which has yet to be finalised.

PROGRESS AGAINST MINING CHARTER TARGETS

The Mining Charter serves as a guide to the industry, focusing the transformation journey on nine key elements. A template designed by the Department of Mineral Resources enables mining companies to provide the information necessary to assess their success in achieving key Mining Charter targets.

The following table provides a synopsis of our performance against the targets for each of the Mining Charter's nine pillars for the calendar year ended 31 December 2015.

1. Reporting	
We are required to report the level of compliance with the Mining Charter by calendar year.	
Target	**Compliance as at 31 December 2015**
Annually	✓
2. Ownership	
We are required to transfer 26% of Harmony's equity to historically disadvantaged South African entities. Beneficiaries could include entrepreneurs, employees and community trusts.	
Target	**Compliance as at 31 December 2015**
26%	More than 26%
3. Housing and living conditions	
Mining companies housing employees in hostels are required to provide single-person rooms, as well as family units.	
Target	**Compliance as at 31 December 2015**
Occupancy rate of one room per person Family units established	100% Hostels have been upgraded to allow for one person per room, converting some hostels into family units and establishing home ownership programmes which include the construction of houses. Harmony is working in partnership with the Department of Human Settlements to convert old hostels into family units. Masimong has been completed while Merriespruit is in progress. A key challenge was to comply fully regarding the Doornkop mining licence. For more information, please refer to the Employees and Communities section.
4. Procurement and enterprise development	
We are required to achieve a certain level of procurement spending with black-owned entities in order to encourage the economic empowerment and development of such suppliers.	
Target	**Compliance as at 31 December 2015**
Capital goods: 40% Services: 70%	Capital goods: 83% Services: 81%

Consumer goods: 50% Annual contribution by multinational suppliers to socio-economic development: 0.5% of the value of any supply contract	Consumer goods: 77% Harmony engages with all its multinational suppliers urging them to contribute to socio-economic development, as prescribed by the Mining Charter. Harmony is also exploring the potential of a Harmony-supported fund for this same purpose, which will allow for proper monitoring of contributions made by our suppliers. Harmony has done much to empower and develop black-owned suppliers and/or to encourage ownership transformation of supplier companies. For more details, see Procurement in the Employees and Communities section.

5. Employment equity

Workplace diversity and equitable representation by historically disadvantaged South Africans at all levels with the company are seen as catalysts for social cohesion, transformation and competitiveness. Representation by historically disadvantaged South Africans:

Target	**Compliance as at 31 December 2015**
Board: 40%	Board: 57%
Senior management (executive committee): 40%	Senior management (executive committee): 45%
Middle management: 40%	Middle management: 46%
Junior management: 40%	Junior management: 61%
Core skills: 40%	Core skills: 66%
	Specific emphasis is placed on demographic representation and of that by women in particular. Although all group-wide employment equity targets have been met, further efforts are being made to ensure we are fully transformed at an operational level as well.

6. Human resource development

Employee skills development is integral to social transformation in the workplace and to sustainable growth. We are required to contribute to the development of the requisite skills and to support South African-based research and development initiatives intended to develop solutions to exploration, mining, processing, technology efficiency, beneficiation and environmental conservation challenges.

Target	**Compliance as at 31 December 2015**
Percentage of total payroll to be invested: 5%	Percentage of payroll invested: 6.1%

7. Mine community development

To achieve our social licence to operate, we need to make meaningful contributions towards community development, particularly in communities close to the mines and in labour-sending areas. Development programmes must be based on a clear assessment of development needs, in line with local Integrated Development Plans.

Target	**Compliance as at 31 December 2015**
Plan implementation as at 30 December 2015	90%

8. Sustainable development and growth

Given that mineral resources are non-renewable, it is important to balance the economic benefits of mining with the social and environmental needs of our communities and thus we are required to meet specific obligations in respect of health, safety and environmental management. As one of the most-regulated

industries in South Africa, the mining industry has highly developed health, safety and environmental strategies in place to improve the industry's management and performance in this regard.	
Target	**Compliance as at 31 December 2015**
Implementation of approved	Implementation of approved Environmental Management Programmes: 100%
Environmental Management Programmes: 100%	Refer to the Environmental Performance section for more details.
Use of South African-based research facilities for the analysis of samples: 100%	Percentage of samples analysed at South African research facilities: 100%
9. Beneficiation	
The Mining Charter encourages South African mining companies to beneficiate the minerals they mine. As an incentive, beneficiation advances may be used to offset black economic empowerment ownership requirements. We benefit from our shareholding in Rand Refinery (Pty) Limited. All our gold is fully refined and beneficiated to final product within South Africa for sale to customers. In addition, Harmony beneficiates the gold it produces at its jewellery school in Welkom. The first commercial outlets supplied by the school were opened in April 2015.	

TOTAL SCORE:		88%

OPERATIONAL PERFORMANCE

Achievements FY16	Challenges FY16
• Safety performance improved by 33% in terms of lost-time injuries • Produced 1.082Moz of gold, in line with guidance • Underground grade recovered increased, for the fourth consecutive year, to 5.02g/t • Bambanani remained the lowest cost underground mine with an all-in sustaining cost of US$654/oz and the highest underground recovered grade at our South African operations of 12.99g/t • Phakisa performed best in comparison to the previous year recording a 28% increase in production and a 14% increase in recovered grade • Sustained productivity improvements	• Increasing margins and profitability at Kusasalethu and Hidden Valley • Infrastructure and equipment maintenance to prevent failures • Continued focus on maintaining and increasing productivity levels

WHY OUR OPERATIONAL PERFORMANCE IS MATERIAL

Gold mining and gold production are central to Harmony's existence. Maintaining and growing our margins as efficiently as we can is essential to sustaining our business and meeting our strategic objectives. This includes delivering safely on our operational plans, reducing costs, improving productivity and maximising revenue.

Our approach takes into consideration the long-term sustainability of the company as a whole. We aim to mine those areas which will return a positive cash flow.

The revenue we generate and ultimately the profit we make are determined by the price received for the gold we sell, and this is determined by the prevailing gold price measured in US dollars on world markets. Furthermore, the prices received in our operational and functional currencies – the South Africa rand and the Papua New Guinea kina which affect 93% and 7% of our production respectively – are governed by the prevailing exchange rates in terms of the US dollar. The kina is our functional currency in Papua New Guinea and these values are in turn converted into rands, Harmony's presentation currency.

We are price takers and have no influence on the gold price or exchange rates. However, the effect of a lower US dollar gold price has been mitigated by a decline in the exchange rate of the rand and/or kina versus the US dollar, which increases the rand price and/or kina price received per ounce of gold. The contra-cyclical behaviour of the US dollar price of gold and the rand-US dollar and kina-US dollar exchange rate often work to our advantage.

OPERATING PERFORMANCE FY16

Our focus is on producing profitable ounces, safely, and good progress was made in FY16. Increased production mainly at Tshepong and Phakisa, as well as at Bambanani, Doornkop, Joel, Unisel and the surface rock dumps offset declines in production at other operations.

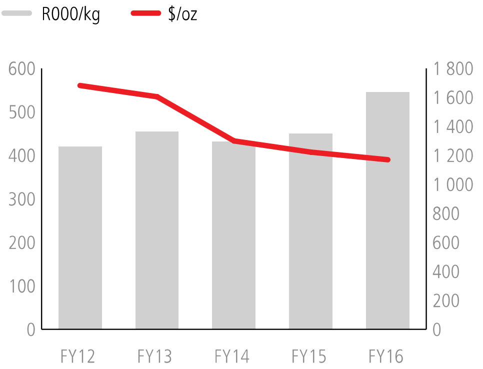
Higher gold production in FY16, together with a higher average rand gold price received, delivered a 19% increase in revenue to R18.3 billion (a 6% decrease to US$1.27 billion). The average rand gold price increased by 21% to R544 984/kg (FY15: R449 570/kg), owing to a 27% weakening of the rand against the US dollar to US$/R14.50 (offsetting the 4% decrease in the average gold price received to US$1 169/oz).

During FY16, we persisted with efforts to reduce and contain costs and to restructure our operations for profitability. Despite increases, especially in power and labour costs, cash operating costs in rand terms increased by just 6% year-on-year (16% decrease in US dollars). Overall, cost increases were lower than inflation, with all-in sustaining cost for all operations increasing by only 3% to R467 526/kg, compared to R453 044/kg in FY15 (decrease of 19% to US$1 003/oz from US$1 231/oz in FY15).

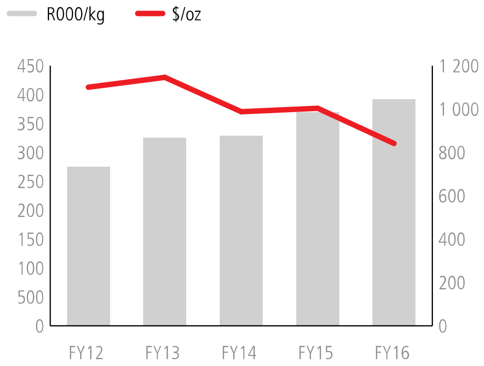
We continue to closely monitor the grade mined and to strictly apply our grade mining principles. The average grade recovered for FY16 increased for the fourth consecutive year. At 5.02g/t for the year, this was 6% higher than in FY15 and 18% higher than in FY12.

Given our focus on margins and the production of profitable ounces, we have reviewed the life-of-mine plans at our higher cost operations. Bambanani, Phakisa and Tshepong together with Phoenix and the surface operation recorded margins of more than 20%. At Kusasalethu, negative cash flows and operating losses resulted in a revision of its life of mine plan to five years with the emphasis on safety and profitability. In addition, we have begun implementing harvesting plans at the low-grade Unisel and Masimong mines.

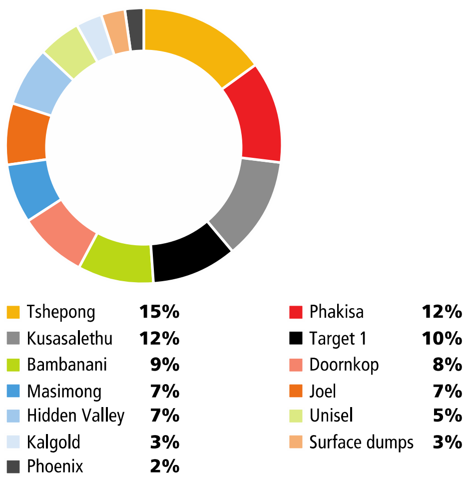
Average annual gold price received



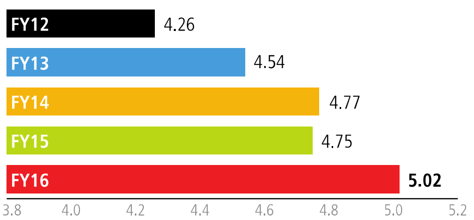
Annual cash operating costs



Contribution to group production by operation (%)



Annual underground grade recovered (g/t)



MAJOR CHALLENGES IN FY16

The major challenges faced during the year and their respective mitigation plans were:

Safety: While safety remains Harmony's key priority and various safety initiatives contributed to improved performance in term of lost-time injuries, there were regrettably 10 fatalities (FY15: 9) at our operations during FY16. These fatalities, together with the section 54/55 notices issued by the Department of Mineral Resources to suspend operations until they were declared safe, resulted in an estimated production loss of 203kg (7 157oz). For more detailed information on our safety performance, please refer to the section on Safety and Health of this report.

Infrastructure and equipment failure: Infrastructure and equipment maintenance remains a daily focus at all our mines. Senior engineering capacity and safety management have been enhanced in order to combat and prevent infrastructure and equipment failures.

Managing operational risks: Operational risk management is integral to our business, and to optimise the gold mining value chain, it is essential to have in place a risk management plan to ensure that all supporting systems are functioning efficiently. Managing risks effectively while working safely and being proactive are core to our success. Safety hazards and operational business risks are identified and dealt with continuously at each of our operations. During FY16, two chief operating officers, who report directly to the chief executive officer, were appointed, one with responsibility for the South African operations and the other with responsibility for safety, mining projects, new business development and corporate strategy.

Delivering on our growth projects and planned mining grades: Delivery on planned growth is vital to deliver on our strategy. The Tshepong-Phakisa integration project is on track and the Joel decline project is scheduled to be completed in FY17. Both these projects will contribute to the production of higher-grade ore. Our code for the mining of grade is strictly applied. No mining takes place below the cut-off grade, we mine only to the average reserve grade and only quality grade ore is mined.

Achieving our operational plans: Production from our South African operations increased by 3% as we began to reap the benefits of development. Increased levels of production at Phakisa, Tshepong, Bambanani and Doornkop in particular contributed to this, offsetting declines at Hidden Valley, Target 1, Kalgold and Kusasalethu.

Increasing recovered grades remains a key objective: The closure of loss-making mining sections at Kusasalethu will have a positive effect on the overall grade in FY16. The total average underground grade recovered for the year increased to 5.02g/t in FY16 from 4.75g/t in FY15.

Productivity: More easily accessible healthcare via our health hubs has contributed to reduced levels of absenteeism and sick leave. As high blood pressure is one of our most serious healthcare concerns, these health hubs enable us to better monitor employee health and treatment programmes. For more information, please refer to the section on Safety and Health of this report.

The benefits of a healthier workforce were reflected in improved productivity rates at year-end, with overall productivity per in-service employee including contractors of 45.6t per employee (FY15: 43.6t per employee). Employees qualify for various bonuses based mainly on safety performance, tonnes and grades mined and costs – all in an effort to increase productivity.

OUTLOOK FOR FY17

Relevant Global Reporting Initiative indicators: G4-EC7 and G4-EC8

Our approach towards our FY17 operational planning:

Our FY17 annual production guidance is in line with our medium-term strategic target to achieve annual production of 1.5Moz at a cost of less than US$950/oz within three years (by FY19) and in so doing to increase our margins. In terms of our strategic plan for the next three years, our target for FY17 is to produce 1.05Moz at a total cost, including capital, of R495 000/kg (US$1 100/oz). These costs assume an estimated increase in inflation of approximately 6% in rands terms. Planned capital expenditure of R2.8 billion (US$200 million) is in line with our strategy.

Highlights of what we expect for FY17:

- All operations to be profitable by the end of the financial year
- A marginal decline in total production to 1.05Moz while the underground recovered grade is maintained
- Bambanani to remain the most profitable operation in South Africa and in the group as a whole – to continue mining the high-grade pillar
- Tshepong's production to increase on higher volumes and a higher recovered grade
- Phakisa to increase profitability as production build up continues
- Joel to increase its cash flow, given the start of production from the decline project
- Masimong to remain profitable with a shorter life of mine, following restructuring
- Doornkop to continue generating a profit in FY17, post its restructuring in FY15
- Kusasalethu to return to profitability by focusing on high-grade areas in the short term

Harmony's production guidance is based on a gold price of R495 000/kg (or US$1 100/oz) and an exchange rate of R14.00/US$ for FY17. Our guidance per operation for FY17 is provided below:

FY17 forecast and guidance

	Production	All-in sustaining cost[1]		Life of mine
Operation	(oz)	(R/kg)	(US$/oz)	(years)
Tshepong	155 000	495 000	1 100	19
Phakisa	135 000	485 000	1 080	10
Bambanani	90 000	350 000	780	5
Target 1	110 000	465 000	1 040	10
Doornkop	85 000	540 000	1 210	17
Joel	67 500	465 000	1 040	11
Kusasalethu	140 000	525 000	1 170	5
Masimong	67 500	525 000	1 170	3
Unisel	55 000	510 000	1 130	6
Underground operations – total	905 000	485 000	1 080	
South Africa surface operations (including Kalgold)	97 500	490 000	1 100	14+
Hidden Valley[2]	[5]47 500	635 000	1 420	
Total	**[4]~ 1.05Moz**	**~ R495 000/kg**	**[3]~ US$1 100/oz**	

[1] All-in sustaining cost excludes share-based payments
[2] Post year-end, Harmony entered into a transaction to fully acquire Hidden Valley
[3] At an exchange rate of R14.00/US$
[4] At a grade of ~5.13g/t
[5] 50% of total production, representing Harmony's share as at 30 June 2016

SOUTH AFRICA – DEEP-LEVEL MINING

Tshepong

		FY16	FY15	FY14
Number of employees				
– Permanent		4 232	4 218	4 132
– Contractors		250	210	216
Total		4 482	4 428	4 348
Operational				
Volumes milled	(000t) (metric)	1 088	992	947
	(000t) (imperial)	1 200	1 095	1 044
Gold produced	(kg)	5 031	4 278	4 223
	(oz)	161 751	137 540	135 772
Gold sold	(kg)	5 029	4 337	4 204
	(oz)	161 685	139 437	135 161
Grade	(g/t)	4.62	4.31	4.46
	(oz/t)	0.135	0.126	0.130
Productivity	(g/TEC)	100.52	86.05	84.33
Development results				
Total metres		12 077	13 053	12 762
Reef metres		1 745	1 822	2 209
Capital metres		0	0	79
Financial				
Revenue	(Rm)	2 756	1 948	1 822
	(US$m)	190	170	176
Average gold price received	(R/kg)	547 967	449 211	433 425
	(US$/oz)	1 176	1 221	1 302
Cash operating cost	(Rm)	1 845	1 588	1 379
	(US$m)	127	139	133
Production profit/(loss)	(Rm)	912	337	457
	(US$m)	63	29	44
Capital expenditure	(Rm)	307	313	301
	(US$m)	21	27	29
Cash operating cost	(R/kg)	366 767	371 149	326 498
	(US$/oz)	787	1 008	981
All-in sustaining cost	(R/kg)	438 401	454 512	407 093
	(US$/oz)	940	1 235	1 223
Safety				
Number of fatalities		0	1	2
Lost-time injury frequency rate per million hours worked		6.40	5.72	8.33
Environment				
Electricity consumption	(GWh)	301	307	301
Water consumption – primary activities	(ML)	1 230	1 110	1 090
Greenhouse gas emissions	(000t CO_2e)	306	316	299
Intensity data per tonne treated				
– energy		0.27	0.31	0.32
– water		1.13	1.12	1.15
– greenhouse gas emissions		0.27	0.32	0.32

		FY16	FY15	FY14
Number of reportable environmental incidents		0	0	1
Community				
Local economic development*	(Rm)	7	33	30
Training and development	(Rm)	37	33	24
* Included in the total for FY15 is an amount of R24 million that was capitalised as part of the hostel upgrades (FY16: R0 million)				
Other salient features				
Status of operation	Steady state operation: development continues			
Life of mine	19 years			
Hoisting capacity (per month)	214 000 tonnes (235 892 tons)			
Compliance and certification	New order mining right – December 2007 ISO 14001 ISO 9001			

Mineral reserves as at 30 June 2016

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	17.1	5.49	94	3.5	4.39	16	20.7	5.30	110
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	18.9	0.160	3 022	3.9	0.128	500	22.8	0.155	3 522

Tshepong is located in the Free State Province, near Welkom, about 248km from Johannesburg. Mining is conducted to a depth of 2 349m. The mine uses conventional undercut mining in the Basal Reef while the B Reef is exploited as a high grade secondary reef. Ore mined is processed at the Harmony One plant.

During FY16, no fatalities occurred and Tshepong achieved 2 million fatality-free shifts at the end of May 2016.

In FY16, Tshepong was Harmony's largest contributor to gold production and production profit. Increased productivity and focus on mining efficiencies contributed to the improved performance in FY16. The continued build-up in production from the sub-66 decline is driving the improvement in grade.

Gold production increased by 18% to 5 031kg (161 751oz) in FY16, primarily due to an increase in volumes and improved grade recoveries. Ore milled increased by 10% to 1 088 000 tonnes (1 200 000 tons), while recovered gold grade increased by 7% to 4.62g/t (0.135 oz/t). The increase in gold production and the average rand gold price received (by 22% to R547 967) resulted in a 41% increase in revenue to R2 756 million (12% increase to US$190 million).

Poor ground conditions affected progress of the sub-71 major capital project during FY16. A project team is in the process of compiling the feasibility study for the sub-75 decline extension project down to 77 level. A study is underway to investigate further synergies with the integration of the Tshepong and Phakisa mines and ways of optimising these synergies so as to improve the financial metrics of the combined operation, as Tshepong's infrastructure is under-utilised.

Cash operating costs increased by 16% to R1 845 million (decreased by 9% to US$127 million) mainly due to increased production in FY16, labour cost increases and higher electricity tariffs.

Capital expenditure decreased by 2% to R307 million (decreased by 22% to US$21 million). Capital was mainly spent on ongoing development.

Challenges receiving management's attention are to manage the geologically complex (excessive fault and dyke intrusions) decline area and illegal mining activities.

Phakisa

		FY16	FY15	FY14
Number of employees				
– Permanent		3 547	3 344	3 460
– Contractors		350	392	325
Total		3 897	3 736	3 785
Operational				
Volumes milled	(000t) (metric)	686	611	577
	(000t) (imperial)	756	674	636
Gold produced	(kg)	3 988	3 118	2 976
	(oz)	128 217	100 246	95 680
Gold sold	(kg)	3 991	3 156	2 963
	(oz)	128 314	101 468	95 263
Grade	(g/t)	5.81	5.10	5.16
	(oz/t)	0.170	0.149	0.150
Productivity	(g/TEC)	93.54	76.99	70.72
Development results				
Total metres		11 022	12 138	11 298
Reef metres		1 785	1 749	1 364
Capital metres		0	162	101
Financial				
Revenue	(Rm)	2 186	1 420	1 284
	(US$m)	151	124	124
Average gold price received	(R/kg)	547 829	449 969	433 199
	(US$/oz)	1 175	1 223	1 302
Cash operating cost	(Rm)	1 378	1 166	1 068
	(US$m)	95	102	103
Production profit/(loss)	(Rm)	811	239	223
	(US$m)	56	21	21
Capital expenditure	(Rm)	323	403	360
	(US$m)	22	35	35
Cash operating cost	(R/kg)	345 457	373 876	358 995
	(US$/oz)	741	1 016	1 079
All-in sustaining cost	(R/kg)	436 477	495 644	478 645
	(US$/oz)	936	1 347	1 438
Safety				
Number of fatalities		2	0	1
Lost-time injury frequency rate per million hours worked		6.64	8.76	7.73
Environment				
Electricity consumption	(GWh)	152	143	126
Water consumption – primary activities	(ML)	1 254	1 155	1 090
Greenhouse gas emissions	(000t CO2e)	154	147	125
Intensity data per tonne treated				
– energy		0.22	0.23	0.22
– water		1.83	1.89	1.89
– greenhouse gas emissions		0.22	0.24	0.22

		FY16	FY15	FY14
Number of reportable environmental incidents		0	0	0
Community				
Local economic development*	(Rm)	6	12	11
Training and development	(Rm)	35	32	30
* Included in the total for FY15 is an amount of R3 million that was capitalised as part of the hostel upgrades (FY16: R0 million)				
Other salient features				
Status of operation	Production ramp up continues			
Life of mine	10 years			
Hoisting capacity (per month)	103 000 tonnes (113 537 imperial tons)			
Compliance and certification	New order mining right – December 2007 ISO 14001 ISO 9001 OHSAS 18001			

Mineral reserves as at 30 June 2016

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	5.6	6.56	37	1.9	7.17	14	7.5	6.72	50
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	6.2	0.191	1 185	2.1	0.209	437	8.3	0.196	1 622

Phakisa is located in the Free State Province, some 252km from Johannesburg. The mine has two shafts, the main Phakisa shaft and the Nyala shaft. The latter is used to hoist rock and serves as a second escape route. Phakisa exploits the Basal Reef. Mining is conducted to a depth of 2 426m. Ore mined is processed at the Harmony One plant. Phakisa is still building up to full production which is expected within the next 18 months.

The lost-time injury frequency rate improved by 24% to 6.64 per million hours worked in FY16. Regrettably two fatalities occurred during the year.

In line with the planned build-up of production at Phakisa, gold production increased by 28% to 3 988kg (128 217oz), as a result of the 12% increase in the ore milled (to 686 000 tonnes or 756 000 tons) and the 14% increase in the recovered grade to 5.81g/t (0.170oz/t).

Phakisa is delivering on plan and consistently meeting development targets. Increased focus on efficiencies and productivity will further enhance the operating margin of the operation. Management are conducting optimisation studies to integrate the Tshepong and Phakisa mines.

The increase in gold production and 22% increase in the average rand gold price received resulted in a 54% increase in revenue to R2 186 million (22% increase to US$151 million).

Cash operating costs increased by 18% to R1 378 million (decreased by 7% to US$95 million) due to increased production and an increase in wages and electricity tariffs.

Capital expenditure decreased by 20% to R323 million (37% to US$22 million), primarily due to the completion of the major capital projects in the prior year. Capital was spent mainly on ongoing development in FY16.

Risks receiving management's focus include managing logistical challenges including the single-man winder arrangement, the Koepe rock winder and the rail-veyor^{TM} ore-handling system.

Bambanani

		FY16	FY15	FY14
Number of employees				
– Permanent		1 491	1 517	1 584
– Contractors		321	330	444
Total		1 812	1 847	2 028
Operational				
Volumes milled	(000t) (metric)	232	229	206
	(000t) (imperial)	256	253	227
Gold produced	(kg)	3 013	2 908	2 576
	(oz)	96 870	93 495	82 821
Gold sold	(kg)	3 015	2 947	2 567
	(oz)	96 934	94 748	82 530
Grade	(g/t)	12.99	12.70	12.50
	(oz/t)	0.378	0.370	0.365
Productivity	(g/TEC)	156.54	153.08	157.73
Development results				
Total metres		1 743	1 150	1 092
Reef metres		105	15	0
Capital metres		0	0	0
Financial				
Revenue	(Rm)	1 617	1 330	1 111
	(US$m)	112	116	107
Average gold price received	(R/kg)	536 410	451 200	432 706
	(US$/oz)	1 151	1 226	1 300
Cash operating cost	(Rm)	808	697	574
	(US$m)	56	61	55
Production profit/(loss)	(Rm)	806	625	537
	(US$m)	56	55	52
Capital expenditure	(Rm)	106	110	125
	(US$m)	7	10	12
Cash operating cost	(R/kg)	268 305	239 552	222 764
	(US$/oz)	576	651	669
All-in sustaining cost	(R/kg)	304 634	270 623	255 500
	(US$/oz)	654	735	768
Safety				
Number of fatalities		0	1	1
Lost-time injury frequency rate per million hours worked		3.59	4.63	7.46
Environment				
Electricity consumption	(GWh)	140	133	143
Water consumption – primary activities	(ML)	1 434	1 731	1 665
Greenhouse gas emissions	(000t CO2e)	142	137	142
Intensity data per tonne treated				
– energy		0.60	0.59	0.69
– water		6.18	7.57	8.08
– greenhouse gas emissions		0.60	0.61	0.69

Number of reportable environmental incidents		0	0	0
Community				
Local economic development	(Rm)	9	3	3
Training and development*	(Rm)	25	17	13

* Expenditure on training and development at Bambanani includes that at Steyn 2 for FY14

Other salient features	
Status of operation	Mature operation with focus on mining of the shaft pillar for the next few years after which it will reach the end of its operating life
Life of mine	5 years
Hoisting capacity (per month)	32 256 tonnes (35 556 tons)
Compliance and certification	New order mining right – December 2007 ISO 14001 ISO 9001 OHSAS 18001

Mineral reserves as at 30 June 2016

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	1.3	11.08	14	–	–	–	1.3	11.08	14
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	1.4	0.323	449	–	–	–	1.4	0.323	449

Bambanani, near Welkom and about 262km from Johannesburg, has two surface shafts (the East and West shafts). Mining is conducted to a depth of 2 365m. Activities at the mine focus on the Basal Reef and are limited to shaft pillar extraction. The ore mined is sent to Harmony One Plant for processing. Given the high risk of seismicity at Bambanani, efforts are focused on managing support systems and the rehabilitation of areas with challenging ground conditions.

The safety performance at Bambanani improved in FY16. No fatalities occurred and the lost-time injury frequency rate improved by 22% to 3.59 per million hours worked. The shaft management team remains committed to improving the safety performance of the operation.

Bambanani's all-in sustaining costs are less than US$700/oz (R310 000/kg), and is one of Harmony's most profitable mines.

The decline shaft was commissioned towards the end of FY16 and is expected to be completed during the September 2016 quarter. All reef is now being hoisted via West Shaft, while the hoisting of waste will continue at East Shaft for the duration of the mining of the shaft pillar.

Gold production increased by 4% to 3 013kg (96 870oz) in FY16. This was primarily due to the increase in recovered grade and ore production. Recovered grade increased by 2% to 12.99g/t (0.378oz/t), while ore milled increased by 1% to 232 000 tonnes (256 000 tons).

Despite the overall increase in production and grade, production during the second half of the financial year was impacted by stoppages and delays caused by a shaft infrastructure accident. Aging infrastructure resulted in electrical cables being dislodged from their mountings causing damage to parts of the mine. A comprehensive programme and engineering strategy has been implemented to mitigate this risk going forward. Further production delays were caused by underground fires started by illegal miners in a mined out area. Fire mitigation plans, equipment and infrastructure upgrades have been implemented to protect the mining area.

The increases in gold production and the 19% increase in the average rand gold price received in FY16 contributed to a 22% increase in revenue to R1 617 million (3% decrease to US$112 million mainly due to the 27% weakening of the rand/us dollar exchange rate to R14.50, mainly offset by the increase in the rand gold price).

Cash operating costs increased by 16% to R808 million (or 8% to US$56 million), mainly due to an increase in labour costs arising from the wage agreement settlement and shaft related performance bonuses. Electricity costs increased due to increased electricity tariffs and consumption during FY16.

Capital expenditure decreased by 4% to R106 million (a decrease of 30% to US$7 million). Most of this was spent on the decline shaft project and ongoing capital development.

Target 1

		FY16	FY15	FY14
Number of employees				
– Permanent		1 653	1 683	1 624
– Contractors		272	266	270
Total		1 925	1 949	1 894
Operational				
Volumes milled	(000t) (metric)	739	749	771
	(000t) (imperial)	814	826	851
Gold produced	(kg)	3 387	3 824	4 493
	(oz)	108 895	122 944	144 453
Gold sold	(kg)	3 419	3 868	4 508
	(oz)	109 923	124 358	144 936
Grade	(g/t)	4.58	5.11	5.83
	(oz/t)	0.134	0.149	0.170
Productivity	(g/TEC)	155.77	172.25	206.06
Development results				
Total metres		3 459	4 174	4 292
Reef metres		182	290	436
Financial				
Revenue	(Rm)	1 833	1 738	1 948
	(US$m)	126	152	188
Average gold price received	(R/kg)	536 196	449 319	432 031
	(US$/oz)	1 150	1 221	1 298
Cash operating cost	(Rm)	1 242	1 178	1 049
	(US$m)	86	103	101
Production profit/(loss)	(Rm)	583	547	897
	(US$m)	40	48	87
Capital expenditure	(Rm)	322	296	289
	(US$m)	22	26	28
Cash operating cost	(R/kg)	366 814	308 156	233 487
	(US$/oz)	787	837	702
All-in sustaining cost	(R/kg)	471 876	395 669	306 605
	(US$/oz)	1 012	1 075	921
Safety				
Number of fatalities		2	0	0
Lost-time injury frequency rate per million hours worked		4.91	4.51	1.30
Environment				
Electricity consumption	(GWh)	247	242	242
Water consumption – primary activities	(ML)	808	808	790

		FY16	FY15	FY14
Greenhouse gas emissions	(000t CO2e)	251	249	251
Intensity data per tonne treated				
– energy		0.33	0.32	0.31
– water		1.09	1.22	1.02
– greenhouse gas emissions		0.33	0.33	0.31
Number of reportable environmental incidents		0	0	0
Community				
Local economic development	(Rm)	4	4	4
Training and development	(Rm)	34	30	20
Other salient features				
Status of operation	Single, cost efficient shaft operation.			
Life of mine	10 years			
Hoisting capacity (per month)	89 994 tonnes (99 200 tons)			
Compliance and certification	New order mining right – December 2007 ISO 14001, ISO 9001, OHSAS 18001			

Mineral reserves as at 30 June 2016

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	2.7	4.59	12	3.9	4.75	18	6.6	4.69	31
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	3.0	0.134	401	4.3	0.139	591	7.3	0.137	992

Target 1 is located in the Free State Province, some 270km southwest of Johannesburg. Mining operations at Target 1 comprise one primary underground mine, to a depth of approximately 2 945m. While most of the ore extracted comes from mechanised mining (massive mining techniques), conventional stoping is still employed primarily to de-stress areas ahead of mechanised mining. Ore mined is processed at the Target plant. The gold mineralisation currently exploited at Target 1 is contained within a succession of Elsburg and Dreyerskuil quartz pebble conglomerate reefs.

Target 1 manages its risks by focusing on trackless development to ensure the timeous availability of massive stopes and to prevent excessive dilution from waste and backfill in the pillar areas which could impact negatively on the delivered grade. Future success will depend on the availability of trackless mining equipment and performance regarding volumes and grade.

The lost-time injury frequency rate increased by 9% to 4.91 per million hours worked in FY16. Regrettably two fatalities occurred during the year.

Gold production decreased by 11% to 3 387kg (108 895oz) in FY16. The Target 1 operation was adversely impacted by safety and work stoppages during the third quarter of FY16. Under performance on trackless development to access the higher grade massive stopes also impacted grade recoveries.

As a result, the recovered gold grade declined by 10% to 4.58g/t (0.134oz/t) and ore milled declined by 1% to 739 000 tonnes (814 000 tons). The decrease in gold production was offset by an increase in the average gold price received (19% to R536 196/kg) resulting in a 5% increase in revenue to R1 833 million (17% decrease to US$126 million).

Cash operating costs rose by 5% to R1 242 million (17% decrease to US$86 million). Reduced expenditure on consumables partially offset an increase in labour and electricity costs.

Capital expenditure increased by 9% to R322 million (decrease of 15% to US$22 million) mainly due to the purchase of production vehicles and increase in ongoing development capital expenditure.

Doornkop

		FY16	FY15	FY14
Number of employees				
– Permanent		2 471	2 977	2 836
– Contractors		443	493	736
Total		2 914	3 470	3 572
Operational				
Volumes milled	(000t) (metric)	630	603	737
	(000t) (imperial)	695	665	812
Gold produced	(kg)	2 730	2 663	2 603
	(oz)	87 772	85 618	83 687
Gold sold	(kg)	2 712	2 711	2 633
	(oz)	87 193	87 160	84 653
Grade	(g/t)	4.33	4.42	3.53
	(oz/t)	0.126	0.129	0.103
Productivity	(g/TEC)	83.49	68.47	63.57
Development results				
Total metres (excl. capital metres)		7 766	8 919	8 322
Reef metres		1 688	1 701	1 475
Capital metres		0	0	0
Financial				
Revenue	(Rm)	1 480	1 220	1 126
	(US$m)	102	107	109
Average gold price received	(R/kg)	545 770	449 857	427 728
	(US$/oz)	1 171	1 222	1 285
Cash operating cost	(Rm)	1 058	1 071	1 095
	(US$m)	73	94	106
Production profit/(loss)	(Rm)	433	128	28
	(US$m)	30	12	3
Capital expenditure	(Rm)	208	245	238
	(US$m)	14	21	23
Cash operating cost	(R/kg)	387 585	402 065	420 617
	(US$/oz)	831	1 092	1 264
All-in sustaining cost	(R/kg)	473 562	501 151	513 348
	(US$/oz)	1 016	1 362	1 543
Safety				
Number of fatalities		0	1	11
Lost-time injury frequency rate per million hours worked		12.27	7.14	9.06
Environment				
Electricity consumption	(GWh)	203	205	187
Water consumption – primary activities	(ML)	1 135	733	1 010
Greenhouse gas emissions	(000t CO2e)	206	211	186
Intensity data per tonne treated				
– energy		0.32	0.34	0.25
– water		1.80	1.26	1.37
– greenhouse gas emissions		0.32	0.35	0.25

		FY16	FY15	FY14
Number of reportable environmental incidents		0	0	0
Community				
Local economic development*	(Rm)	4	37	25
Training and development	(Rm)	30	35	23
* Included in the total for FY16 is an amount of R1 million that was capitalised as part of the hostel upgrades (FY15: R28 million)				
Other salient features				
Status of operation	Mining takes place on the South Reef at this single-shaft operation.			
Life of mine	17 years			
Hoisting capacity (per month)	91 480 tonnes (100 839 tons)			
Compliance and certification	New order mining right – October 2008 ISO 14001, ISO 9001, OHSAS 18001			

Mineral reserves as at 30 June 2016

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	1.7	5.03	9	2.6	5.21	13	4.3	5.14	22
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	1.9	0.147	278	2.8	0.152	431	4.7	0.150	709

Doornkop, a single-shaft operation, is located in the Gauteng province of South Africa, approximately 30km west of Johannesburg, on the northern rim of the Witwatersrand Basin. Mining is conducted to a depth of 1 978m. The operation focuses on narrow-reef conventional mining of the South Reef. The ore from the operation is processed at the Doornkop plant.

There were no fatalities in FY16, however, the lost time injury frequency rate increased to 12.27 per million hours worked in FY16 compared to 7.14 in FY15. The shaft management team remains committed to improving the safety performance of the operation.

The Doornkop operation was restructured towards the end of FY15 to respond to the low gold price environment and the significant capital investment required to sustain the operations at this shaft. The section 189A process was concluded at the end of July 2015. The majority of employees and contractors affected were transferred to vacant positions at other operations.

Doornkop's life-of-mine plan focuses on mining the higher-grade areas of the South Reef ore body on 192 and 197 levels. Greater emphasis was placed on improving operating efficiencies in FY16. Gold production increased by 3% to 2 730kg (87 772oz) in FY16 mainly due to an increase in ore milled of 4% to 630 000 tonnes (630 000 tons). The recovered gold grade reduced marginally by 2% to 4.33g/t (0.126oz/t).

The increase in gold production, combined with the 21% increase in the average rand gold price received, resulted in a 21% increase in revenue to R1 480 million (the 5% decrease to US$102 million is mainly due to the 27% weakening of the rand/US dollar average exchange rate to R14.50 in FY16, mostly offset by the increase in the rand gold price). Improved operational efficiencies, the increase in the rand gold price and in production resulted in the increased operating margin for Doornkop, which also contributed to the increased profitability of the updated life-of-mine plan for FY17.

Cash operating costs decreased by 1% to R1 058 million (decreased by 22% to US$73 million).

Capital expenditure decreased by 15% to R208 million (decreased by 33% to US$14 million) owing to reduced capital requirements resulting from the restructuring in FY15 and was spent mainly on development.

Joel

		FY16	FY15	FY14
Number of employees				
– Permanent		1 796	1 818	1 594
– Contractors		97	81	189
Total		1 893	1 899	1 783
Operational				
Volumes milled	(000t) (metric)	542	551	548
	(000t) (imperial)	597	607	604
Gold produced	(kg)	2 278	2 258	2 335
	(oz)	73 239	72 596	75 072
Gold sold	(kg)	2 245	2 330	2 308
	(oz)	72 179	74 911	74 204
Grade	(g/t)	4.20	4.10	4.26
	(oz/t)	0.123	0.119	0.124
Productivity	(g/TEC)	117.33	115.65	125.78
Development results				
Total metres		3 541	3 200	2 881
Reef metres		2 315	1 037	1 079
Capital metres		485	338	993
Financial				
Revenue	(Rm)	1 220	1 046	995
	(US$m)	84	91	96
Average gold price received	(R/kg)	543 442	449 026	430 929
	(US$/oz)	1 166	1 220	1 295
Cash operating cost	(Rm)	845	755	688
	(US$m)	58	66	66
Production profit/(loss)	(Rm)	389	276	327
	(US$m)	27	24	32
Capital expenditure	(Rm)	215	182	145
	(US$m)	15	16	14
Cash operating cost	(R/kg)	371 080	334 168	294 493
	(US$/oz)	796	908	885
All-in sustaining cost	(R/kg)	424 617	384 022	330 648
	(US$/oz)	911	1 043	994
Safety				
Number of fatalities		1	0	2
Lost-time injury frequency rate per million hours worked		3.49	3.72	3.25
Environment				
Electricity consumption	(GWh)	108	101	103
Water consumption – primary activities	(ML)	816	671	498
Greenhouse gas emissions	(000t CO_2e)	109	104	102
Intensity data per tonne treated				
– energy		0.19	0.18	0.19
– water		1.50	1.22	0.91

		FY16	FY15	FY14
– greenhouse gas emissions		0.19	0.19	0.19
Number of reportable environmental incidents		0	0	0
Community				
Local economic development	(Rm)	3	3	3
Training and development	(Rm)	15	15	11
Other salient features				
Status of operation	Twin-shaft operation – technically challenging			
Life of mine	11 years			
Hoisting capacity (per month)	47 174 tonnes (52 000 tons)			
Compliance and certification	New order mining right – December 2007 ISO 14001 ISO 9001 OHSAS 18001			

Mineral reserves as at 30 June 2016

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	2.6	5.26	14	3.0	4.61	14	5.5	4.91	27
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	2.8	0.153	435	3.3	0.134	440	6.1	0.143	875

Joel is located in the Free State Province and about 292km from Johannesburg, on the southern edge of the Witwatersrand Basin. The mine comprises two shafts, the North and South shafts. The primary economic reef horizon at Joel is a narrow tabular Beatrix Reef deposit which is accessed via conventional grid development. Mining is conducted to a depth of 1 452m. The ore is processed at the Joel plant.

The lost-time injury frequency rate improved by 3% to 3.49 per million hours worked. Regrettably a fatality occurred in August 2015. The stoppage that ensued resulted in a loss of 52kg (1 672oz).

Managing shaft and project schedules is critical for Joel. Capital development on the decline project progressed well in FY16 and is expected to be completed in FY17. First production from this area is expected in July 2017. Joel's future operating life depends on the successful completion of the decline project, which began in FY15.

Gold production increased by 1% to 2 278kg (73 239oz) in FY16. Recovered gold grades improved by 2% to 4.20g/t (0.123oz/t) which offset the 2% decrease in ore milled to 542 000 tonnes (597 000 tons). The increase in gold production and the increase in the average rand gold price received (by 21% to R543 442/kg), resulted in a 17% increase in revenue to R1 220 million (8% decrease to US$84 million).

Cash operating costs increased by 12% to R845 million (decreased by 12% to US$58 million) mainly due an increase in labour costs and higher electricity costs arising from increased usage and higher tariffs.

Capital expenditure increased by 18% to R215 million (decreased by 6% to US$15 million) primarily due to major capital spent on the 137 decline project.

Kusasalethu

		FY16	FY15	FY14
Number of employees				
– Permanent		3 944	3 898	5 139
– Contractors		539	1 020	1 302
Total		4 483	4 918	6 441
Operational				
Volumes milled	(000t) (metric)	668	908	1 143
	(000t) (imperial)	736	1 001	1 260
Gold produced	(kg)	3 863	3 953	4 694
	(oz)	124 198	127 092	150 916
Gold sold	(kg)	3 822	4 297	4 531
	(oz)	122 880	138 151	145 673
Grade	(g/t)	5.78	4.35	4.11
	(oz/t)	0.169	0.127	0.120
Productivity	(g/TEC)	77.80	65.59	73.60
Development results				
Total metres		7 183	13 777	15 077
Reef metres		1 517	2 436	3 107
Capital metres		0	59	–
Financial				
Revenue	(Rm)	2 078	1 939	1 959
	(US$m)	143	169	189
Average gold price received	(R/kg)	543 633	451 211	432 358
	(US$/oz)	1 166	1 226	1 299
Cash operating cost	(Rm)	1 848	1 866	1 830
	(US$m)	127	163	177
Production profit/(loss)	(Rm)	262	(57)	206
	(US$m)	18	(5)	20
Capital expenditure	(Rm)	360	463	509
	(US$m)	25	40	49
Cash operating cost	(R/kg)	478 277	472 112	389 762
	(US$/oz)	1 026	1 283	1 171
All-in sustaining cost	(R/kg)	584 498	587 406	513 883
	(US$/oz)	1 254	1 596	1 544
Safety				
Number of fatalities		2	1	3
Lost-time injury frequency rate per million hours worked		7.06	25.80	9.56
Environment				
Electricity consumption	(GWh)	611	682	664
Water consumption – primary activities	(ML)	1 671	1 342	1 418
Greenhouse gas emissions	(000t CO2e)	620	702	660
Intensity data per tonne treated				
– energy		0.91	0.75	0.58
– water		2.50	1.48	1.23
– greenhouse gas emissions		0.91	0.77	0.58

Number of reportable environmental incidents		1	1	2
Community				
Local economic development*	(Rm)	5	30	65
Training and development	(Rm)	26	50	37

* Included in the total for FY15 is an amount of R18 million that was capitalised as part of the hostel upgrades (FY16: R0 million)

Other salient features	
Status of operation	Positioned for profitability
Life of mine	5 years
Hoisting capacity (per month)	200 000 tonnes (220 460 tons)
Compliance and certification	New order mining right – December 2007 ISO 14001, ISO 9001, Cyanide Code

Mineral reserves as at 30 June 2016

	Proved reserves			**Probable reserves**			**Total mineral reserves**		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	3.8	7.15	27	0.2	5.31	1	4.0	7.06	28
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	4.2	0.209	878	0.2	0.155	36	4.4	0.206	914

Kusasalethu is located about 90km from Johannesburg, near the provincial border of Gauteng and North West Province. Kusasalethu is situated in the West Witwatersrand Basin and mines the Ventersdorp Contact Reef as its main ore body. The mine comprises twin vertical and twin sub-vertical shaft systems and uses conventional mining methods in a sequential grid layout. Mining is conducted to a depth of 3 388m, making it Harmony's deepest mine. Ore mined is treated at the Kusasalethu plant.

The lost-time injury frequency rate improved significantly by 73% to 7.06 per million hours worked in FY16. Regrettably two fatalities occurred during the year.

Kusasalethu was restructured during FY15. Levels on the old mine were abandoned and the revised mine plan focused on mining lower volumes at higher grades. The waste and reef splitting system (waste ore pass system) to improve gold recoveries was finalised in FY16. In FY16, the recovered gold grade increased by 33% to 5.78g/t (0.169oz/t) and ore milled reduced by 26% to 668 000 tonnes (736 000 tons) resulting in a 2% decrease in gold production to 3 863kg (124 198oz).

During the second half of FY16, management decided to stop production at the mine for a total period of 21 days in order to perform major engineering infrastructure upgrades. Production was negatively impacted by these stoppages. This was necessary to ensure access to high-grade reserves and to improve safety at the mine.

Negative cash flows in FY16 and previous financial years necessitated a revision of the life-of-mine plan. In order to optimise cash flow, the focus now is on accessing higher grade ore zones and a shorter life-of-mine. The aim is to increase the profitability and operating margin of the operation and to generate positive cash flows. Studies are underway to determine the viability of deepening the mine into the high-grade pay area below the 113 level.

Challenges at the mine include engineering infrastructure, maintaining efficiencies at the metallurgical plant, eliminating illegal mining and gold theft, and producing sufficient backfill at the plant for operational support.

The average rand gold price received increased by 20% to R543 633/kg. Revenue increased by 7% to R2 078 million in FY16 (decreased by 15% to US$143 million).

Capital expenditure decreased by 22% to R360 million (38% decrease to US$25 million), as a result of the restructuring in FY15 to focus on mining lower volumes at higher grades. Capital was spent mainly on development. Cash operating costs decreased by 1% to R1 848 million (22% decrease to US$127 million). Costs reduced mainly due to the decrease in production volumes.

Masimong

		FY16	FY15	FY14
Number of employees				
– Permanent		2 478	2 470	2 868
– Contractors		112	99	118
Total		2 590	2 569	2 986
Operational				
Volumes milled	(000t) (metric)	650	670	670
	(000t) (imperial)	716	739	739
Gold produced	(kg)	2 432	2 463	2 718
	(oz)	78 190	79 187	87 385
Gold sold	(kg)	2 432	2 491	2 708
	(oz)	78 191	80 087	87 064
Grade	(g/t)	3.74	3.68	4.06
	(oz/t)	0.109	0.107	0.118
Productivity	(g/TEC)	83.85	75.27	78.00
Development results				
Total metres		4 755	9 855	10 079
Reef metres		1 549	2 376	1 547
Financial				
Revenue	(Rm)	1 318	1 118	1 171
	(US$m)	91	98	113
Average gold price received	(R/kg)	541 806	448 867	432 416
	(US$/oz)	1 162	1 220	1 299
Cash operating cost	(Rm)	1 038	979	978
	(US$m)	72	86	95
Production profit/(loss)	(Rm)	280	127	188
	(US$m)	19	11	18
Capital expenditure	(Rm)	110	166	168
	(US$m)	8	15	16
Cash operating cost	(R/kg)	426 904	397 380	360 006
	(US$/oz)	916	1 080	1 082
All-in sustaining cost	(R/kg)	493 527	479 096	441 231
	(US$/oz)	1 059	1 302	1 326
Safety				
Number of fatalities		2	1	2
Lost-time injury frequency rate per million hours worked		10.05	12.09	15.80
Environment				
Electricity consumption	(GWh)	172	184	196
Water consumption – primary activities	(ML)	715	859	874
Greenhouse gas emissions	(000t CO2e)	175	190	195
Intensity data per tonne treated				
– energy		0.26	0.28	0.29
– water		1.10	1.28	1.30
– greenhouse gas emissions		0.26	0.29	0.29
Number of reportable environmental incidents		0	0	0

		FY16	FY15	FY14
Community				
Local economic development*	(Rm)	6	6	17
Training and development	(Rm)	22	25	20
Other salient features				
Status of operation	Mature, single shaft operation nearing the end of its life of mine			
Life of mine	3 years			
Hoisting capacity (per month)	108 863 tonnes (120 000 tons)			
Compliance and certification	New order mining right – December 2007 ISO 14001 ISO 9001 OHSAS 18001			

Mineral reserves as at 30 June 2016

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	1.5	4.05	6	0.2	3.82	1	1.7	4.02	7
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	1.6	0.118	193	0.3	0.112	30	1.9	0.117	223

Masimong is located in the Free State Province, near the city of Welkom and about 260km from Johannesburg. The Masimong complex comprises an operating shaft (5 shaft), and a second shaft (4 shaft), which, although closed for mining, is used for ventilation, pumping and as a second outlet. Masimong exploits the Basal Reef and the B Reef. Mining is conducted to a depth of 2 050m. Ore mined is processed at the Harmony One plant.

The lost-time injury frequency rate improved by 17% to 10.05 per million hours worked in FY16. Regrettably two fatalities occurred during the year.

Masimong was restructured in FY15 to improve its profitability by scaling down ore body development in an effort to reduce costs and increase margins. As a result, the expected life of mine was shortened to three years.

During FY16, Masimong's production was negatively impacted by safety stoppages. Grade management and quality mining practices are important to achieve increased recovered grades.

Gold production decreased by 1% to 2 432kg (78 190oz) in FY16. This was primarily due to reduced production volumes, ore milled decreased by 3% to 650 000 tonnes (716 000 tons). Recovered gold grades increased by 2% to 3.74g/t (0.109oz/t).

The decrease in gold production was offset by the 21% increase in the average rand gold price received in FY16 (to R541 806/kg), which contributed to an 18% increase in revenue to R1 318 million (7% decrease to US$91 million mainly due to the weakening of the rand/US dollar exchange rate to R14.50, offset by the increase in the rand gold price).

Cash operating costs increased by 6% to R1 038 million (16% decrease to US$72 million), due mainly to increased labour and contractor costs.

Capital expenditure decreased by 34% to R110 million (decreased by 47% to US$8 million) in line with the reduced capital requirements of the revised mine plan. Capital was spent mainly on ongoing development.

Unisel

		FY16	FY15	FY14
Number of employees				
– Permanent		1 817	1 809	1 809
– Contractors		128	114	148
Total		1 945	1 923	1 957
Operational				
Volumes milled	(000t) (metric)	424	417	408
	(000t) (imperial)	467	460	450
Gold produced	(kg)	1 704	1 695	1 838
	(oz)	54 785	54 495	59 093
Gold sold	(kg)	1 705	1 715	1 834
	(oz)	54 817	55 138	58 964
Grade	(g/t)	4.02	4.06	4.50
	(oz/t)	0.117	0.118	0.131
Productivity	(g/TEC)	77.43	77.82	85.33
Development results				
Total metres		3 145	5 177	5 641
Reef metres		1 917	2 816	3 462
Financial				
Revenue	(Rm)	925	770	792
	(US$m)	64	67	77
Average gold price received	(R/kg)	542 487	449 082	432 072
	(US$/oz)	1 164	1 220	1 298
Cash operating cost	(Rm)	754	674	600
	(US$m)	52	59	58
Production profit/(loss)	(Rm)	171	88	192
	(US$m)	12	7	19
Capital expenditure	(Rm)	62	99	85
	(US$m)	4	9	8
Cash operating cost	(R/kg)	442 359	397 615	326 466
	(US$/oz)	949	1 080	981
All-in sustaining cost	(R/kg)	496 099	469 246	388 785
	(US$/oz)	1 064	1 275	1 168
Safety				
Number of fatalities		0	1	0
Lost-time injury frequency rate per million hours worked		9.61	8.74	11.66
Environment				
Electricity consumption	(GWh)	112	109	110
Water consumption – primary activities	(ML)	563	519	711
Greenhouse gas emissions	(000t CO2e)	113	112	109
Intensity data per tonne treated				
– energy		0.26	0.26	0.27
– water		1.33	1.25	1.74
– greenhouse gas emissions		0.26	0.27	0.27
Number of reportable environmental incidents		0	0	0

		FY16	FY15	FY14
Community				
Local economic development*	(Rm)	4	19	12
Training and development	(Rm)	23	21	15
* Included in the total for FY15 is an amount of R15 million that was capitalised as part of the hostel upgrades (FY16: R0 million)				
Other salient features				
Status of operation	Mature operation reaching the end of life of mine			
Life of mine	6 years			
Hoisting capacity (per month)	60 000 tonnes (66 138 tons)			
Compliance and certification	New order mining right – December 2007 ISO 9001			

Mineral reserves as at 30 June 2016

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	1.2	4.18	5	1.3	4.35	6	2.5	4.27	11
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	1.4	0.122	167	1.4	0.127	180	2.8	0.124	348

Unisel is located in the Free State Province, near Virginia and about 271km from Johannesburg. Mining is conducted to a depth of 2 153m below surface. Conventional scattered mining and pillar reclamation takes place to access the Basal, Leader and, to a lesser extent, the Middle reefs. Ore mined is processed at Harmony One plant.

Unisel is nearing the end of its operating life, but has been a good performer despite being Harmony's oldest operating mine. Unisel's aging operations and infrastructure present significant challenges to the mine's operational flexibility and to the maintenance of production.

There were no fatalities in FY16, however, the lost-time injury frequency rate increased to 9.61 per million hours worked in FY16 compared to 8.74 in FY15.

Gold production remained steady year-on-year and increased by 1% to 1 704kg (54 785oz) in FY16. The recovered gold grade declined by 1% to 4.02g/t (0.117oz/t), while ore milled increased by 2% to 424 000 tonnes (467 000 tons). The increase in gold production and an increase in the average rand gold price received resulted in a 20% increase in revenue to R925 million (4% decrease to US$64 million).

Cash operating costs increased by 12% to R754 million (decreased by 12% to US$52 million) primarily due to an increase in labour costs and electricity tariffs.

Capital expenditure decreased by 37% to R62 million (decreased by 56% to US$4 million) as capital development was reduced in the first half of FY16 to improve the profitability of the mine.

SOUTH AFRICA – SURFACE OPERATIONS

Surface dumps

		FY16	FY15	FY14
Number of employees				
– Permanent		10	10	13
– Contractors		190	174	129
Total		200	184	142
Operational				
Volumes milled	(000t) (metric)	3 041	2 701	2 897
	(000t) (imperial)	3 353	2 978	3 196
Gold produced	(kg)	1 065	862	903
	(oz)	34 241	27 713	29 032
Grade	(g/t)	0.35	0.32	0.31
	(oz/t)	0.010	0.009	0.009
Financial				
Revenue	(Rm)	577	389	386
	(US$m)	40	34	37
Average gold price received	(R/kg)	544 996	450 420	431 172
	(US$/oz)	1 169	1 224	1 296
Cash operating cost	(Rm)	427	330	328
	(US$m)	29	29	32
Production profit/(loss)	(Rm)	158	58	62
	(US$m)	11	5	6
Capital expenditure	(Rm)	18	6	9
	(US$m)	1	1	1
Cash operating cost	(R/kg)	401 033	382 959	363 568
	(US$/oz)	860	1 041	1 092
All-in sustaining cost	(R/kg)	422 205	403 906	383 701
	(US$/oz)	906	1 097	1 153
Safety				
Number of fatalities		0	0	0
Lost-time injury frequency rate per million hours worked		0	2.48	0.83
Environment				
Electricity consumption	(GWh)	66	64	68
Water consumption – primary activities	(ML)	394	480	816
Greenhouse gas emissions	(000t CO2e)	67	66	67
Intensity data per tonne treated				
– energy		0.02	0.02	0.23
– water		0.12	0.18	0.28
– greenhouse gas emissions		0.02	0.02	0.23
Number of reportable environmental incidents		0	0	0
Community				
Local economic development	(Rm)	0	0	0
Other salient features				
Status of operation	The operational plans are for a profitable FY16			
Life of mine	14+ years			
Compliance and certification	Certification depends on future of these operations, ISO 9001			

Mineral reserves as at 30 June 2016 (excluding Phoenix)

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	175.9	0.27	47	567.0	0.23	133	742.9	0.25	180
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	193.9	0.008	1 507	625.0	0.007	4 276	818.9	0.007	5 784

Production from the processing of surface rock dumps situated in the Free State province in South Africa depends entirely on the availability of spare mill capacity at the Harmony One and Target plants, which in turn depends on the availability of underground ore delivered for milling. In FY16, Central Plant only processed re-mined, redundant plant clean-up and rock dumps.

Gold production from the processing of the surface dumps was 24% higher year-on-year in FY16, a result of both increases in volumes processed (increase of 13%) and in the recovered grade (increase of 9%).

The processing of the rock dumps is approaching its end as virtually all of the higher-grade dump material originally available has been processed, leaving only lower-grade material. During FY16, the Central Plant tailings retreatment project started, aimed at upgrading the plant to process only tailings. The life of the tailing retreatment project is expected to be 19 years and upgrades are scheduled to be completed by the end of FY17.

Phoenix (Tailings retreatment)

		FY16	FY15	FY14
Number of employees				
– Permanent		82	83	83
– Contractors		296	312	293
Total		378	395	376
Operational				
Volumes milled	(000t) (metric)	6 465	6 245	6 073
	(000t) (imperial)	7 129	6 887	6 697
Gold produced	(kg)	804	867	835
	(oz)	25 849	27 875	26 846
Gold sold	(kg)	788	881	825
	(oz)	25 335	28 324	26 524
Grade	(g/t)	0.12	0.14	0.14
	(oz/t)	0.004	0.004	0.004
Productivity	(g/TEC)	177.72	185.73	201.11
Financial				
Revenue	(Rm)	429	396	357
	(US$m)	30	35	35
Average gold price received	(R/kg)	544 390	449 941	433 293
	(US$/oz)	1 168	1 223	1 302

		FY16	FY15	FY14
Cash operating cost	(Rm)	320	295	246
	(US$m)	22	26	24
Production profit/(loss)	(Rm)	117	97	117
	(US$m)	8	8	11
Capital expenditure	(Rm)	5	4	2
	(US$m)	–	–	–
Cash operating cost	(R/kg)	398 122	339 896	294 408
	(US$/oz)	854	924	885
All-in sustaining cost	(R/kg)	403 907	344 319	294 615
	(US$/oz)	866	936	885
Safety				
Number of fatalities		0	0	0
Lost-time injury frequency rate per million hours worked		2.06	0.00	0.00
Environment				
Electricity consumption	(GWh)	40	41	67.5
Water consumption – primary activities	(ML)	267	277	228
Greenhouse gas emissions	(000t CO_2e)	41	42	67.1
Intensity data per tonne treated				
– energy		0.006	0.007	0.011
– water		0.04	0.04	0.04
– greenhouse gas emissions		0.006	0.007	0.011
Number of reportable environmental incidents		0	0	0
Other salient features				
Status of operation	Retreatment of tailings using spare processing capacity			
Life of mine	14+ years			
Compliance and certification	New order mining right – December 2007 ISO 14001 certification is under consideration – interim focus is on compliance ISO 9001			

Mineral reserves as at 30 June 2016

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	79.8	0.28	22	–	–	–	79.8	0.28	22
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	88.0	0.008	712	–	–	–	88.0	0.008	712

Phoenix, a tailings retreatment operation situated in Virginia in the Free State Province, makes use of the Saaiplaas plant to retreat tailings. During FY13, Harmony finalised an empowerment agreement and transferred 30% of its shareholding in the Phoenix operations to black economic empowerment owners.

Operational success depends on maintaining plant efficiency and reducing pump and pipe failures. Grade variability and the theft of pipelines and electrical cables are the main risks being managed at Phoenix. Security has been increased in an effort to halt the endemic theft of piping and cables that can affect the integrity of operations.

Year-on-year, gold production declined by 7% to 804kg (25 849oz), mainly as a result of a 14% decrease in the recovered grade to 0.12g/t (0.004oz/t), which was partially offset by a 4% increase in volumes processed to 6 465 000 tonnes (7 129 000 tons).

The increase in the average rand gold price received offset the decrease in gold production, resulting in an 8% increase in revenue to R429 million (decrease of 14% to US$30 million).

Cash operating costs increased by 8% to R320 million (decreased by 15% to US$22 million), due to the higher volumes processed in FY16 and increase in labour costs and electricity tariffs.

Kalgold

		FY16	FY15	FY14
Number of employees				
– Permanent		235	240	230
– Contractors		377	465	471
Total		612	705	701
Operational				
Volumes milled	(000t) (metric)	1 479	1 472	1 472
	(000t) (imperial)	1 630	1 623	1 623
Gold produced	(kg)	1 103	1 198	1 162
	(oz)	35 463	38 517	37 358
Gold sold	(kg)	1 086	1 230	1 203
	(oz)	34 916	39 545	38 677
Grade	(g/t)	0.75	0.81	0.79
	(oz/t)	0.022	0.024	0.023
Productivity	(g/TEC)	116.79	183.86	185.15
Financial				
Revenue	(Rm)	595	551	522
	(US$m)	41	48	50
Average gold price received	(R/kg)	548 072	448 230	433 759
	(US$/oz)	1 176	1 218	1 303
Cash operating cost	(Rm)	548	452	409
	(US$m)	38	40	39
Production profit/(loss)	(Rm)	55	88	103
	(US$m)	4	8	10
Capital expenditure	(Rm)	36	41	33
	(US$m)	2	4	3
Cash operating cost	(R/kg)	496 991	377 547	351 670
	(US$/oz)	1 066	1 026	1 057
All-in sustaining cost	(R/kg)	546 949	422 323	393 401
	(US$/oz)	1 173	1 148	1 182
Safety				
Number of fatalities		0	0	0
Lost-time injury frequency rate per million hours worked		0	2.25	0.90
Environment				

		FY16	FY15	FY14
Electricity consumption	(GWh)	49	40	41
Water consumption – primary activities	(ML)	375	1 795	1 707
Greenhouse gas emissions	(000t CO2e)	50	41	41
Intensity data per tonne treated				
– energy		0.03	0.03	0.03
– water		0.25	1.22	1.16
– greenhouse gas emissions		0.03	0.03	0.03
Number of reportable environmental incidents		0	1	0
Community				
Local economic development	(Rm)	2	2	7
Training and development	(Rm)	5	4	4
Other salient features				
Status of operation	Open-pit mining operation			
Life of mine	19 years			
Compliance and certification	New order mining right – August 2008 ISO 14001 ISO 9001			

Mineral reserves as at 30 June 2016

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	5.3	0.97	5	12.3	1.12	14	17.6	1.07	19
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	5.8	0.028	165	13.6	0.033	444	19.4	0.031	608

Kalgold is an open-pit mine situated 55km southwest of Mahikeng in North West Province and located within the Kraaipan Greenstone Belt. Mining takes place from the A Zone pit. Ore mined is processed at a carbon-in-leach plant located at Kalgold.

Both the A and B mills were replaced in FY16. The elution upgrade project and plant refurbishment upgrades are underway and will improve plant efficiencies. Upgrades to the crushers and improved maintenance will aid improved performance of the operation in future.

Upgrades to the plant and underperformance of the crushing units impacted gold production in FY16. The recovered grade decreased by 7% to 0.75g/t (8% to 0.022oz/t). Ore milled remained stable year-on-year. The lower gold production was offset by the increase in the average rand gold price received which resulted in an 8% increase in revenue to R595 million (a 15% decrease to US$41 million).

Cash operating costs increased by 21% to R548 million (5% increase to US$38 million). Capital expenditure decreased by 12% to R36 million (decreased by 50% to US$2 million).

Risks managed at Kalgold include the prevention of plant intrusions and gold theft and the performance of blasting and hauling operations in the pit.

PAPUA NEW GUINEA

Hidden Valley (50%)

		FY16	FY15	FY14
Number of employees				
Total (including employees of Morobe Mining Joint Ventures)		1 969	2 157	1 980
Operational				
Volumes milled	(000t) (metric)	1 729	1 825	2 001
	(000t) (imperial)	1 906	2 012	2 207
Gold produced	(kg)	2 257	2 943	3 292
	(oz)	72 565	94 619	105 840
Gold sold	(kg)	2 340	3 003	3 307
	(oz)	75 233	96 548	106 322
Grade	(g/t)	1.31	1.61	1.65
	(oz/t)	0.038	0.047	0.048
Financial				
Revenue	(Rm)	1 320	1 346	1 434
Revenue	(US$m)	91	118	138
Average gold price received	(R/kg)	564 272	448 322	433 488
	(US$/oz)	1 210	1 218	1 303
Cash operating cost	(Rm)	1 082	1 153	1 086
	(US$m)	75	101	105
Production profit/(loss)	(Rm)	108	203	344
	(US$m)	7	18	33
Capital expenditure	(Rm)	79	121	122
	(US$m)	5	11	12
Cash operating cost	(R/kg)	479 196	391 774	329 943
	(US$/oz)	1 028	1 065	991
All-in sustaining cost	(R/kg)	597 398	514 690	415 068
	(US$/oz)	1 282	1 395	1 244
Safety				
Number of fatalities		1	1	0
Lost-time injury frequency rate per million hours worked		1.39	0.28	0.00
Environment				
Electricity consumption	(GWh)	54	48	42
Water consumption – primary activities	(ML)	715	722	768
Greenhouse gas emissions	(000t CO2e)	55	0	0
Intensity data per tonne treated				
– energy		0.03	0.03	0.02
– water		0.41	0.39	0.38
– greenhouse gas emissions		0.03	0	0
Number of reportable environmental incidents		0	0	1
Other salient features				
Status of operation	Open-pit mining operation producing gold and silver. A joint venture with Newcrest			
Life of mine	± 7 years			
Compliance and certification	Mining lease approved by Papua New Guinea authorities; Cyanide Code			

Mineral reserves as at 30 June 2016 (Harmony's 50% share#)

	Proved reserves			Probable reserves			Total mineral reserves		
Reserves (metric)	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**	**Tonnes (Mt)**	**Grade (g/t)**	**Gold (000kg)**
	1.3	1.09	1	11.5	1.62	19	12.7	1.57	20
Reserves (imperial)	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**	**Tons (Mt)**	**Grade (oz/t)**	**Gold (000oz)**
	1.4	0.032	47	12.6	0.047	599	140	0.046	644

The Hidden Valley mine is an open pit gold and silver mine, situated in the highly prospective area of the Morobe Province in Papua New Guinea, some 210km northwest of Port Moresby.

The major gold and silver deposits of the Morobe goldfield and Hidden Valley are hosted in the Wau Graben. The Hidden Valley-Kaveroi and Hamata pits, located approximately 6km apart, are in operation. Ore mined is treated at the Hidden Valley processing plant.

During FY16, Hidden Valley's operations were impacted by accident-related stoppages during the first quarter of FY16. The operation was suspended due to a fatality in July 2015 and lost 33 production days as a result. The operation was also adversely affected by poor grade and road closures.

Mining at Kaveroi stage 4 ceased in the fourth quarter of FY16 although milling was sustained by the processing of the lower-grade stockpile and the start of ore production at Hamata. Overall this led to lower tonnages of ore mined and milled.

The outcome for the year was a 23% decline in gold production to 2 257kg (72 565oz), on the back of the decrease in the grade recovered and tonnes milled.

Cash operating costs and capital expenditure decreased due to lower production and the deferral of pre-stripping and stripping activities at Hidden Valley in FY16.

Post-year end, Harmony entered into a transaction to fully acquire Hidden Valley from its joint venture partner. The transaction is subject to the conditions precedent being met.

PROJECTS AND EXPLORATION

HIGHLIGHTS AND MILESTONES OF FY16 EXPLORATION PROGRAMME IN PAPUA NEW GUINEA

Advancement of the Golpu project

- Optimised feasibility and prefeasibility studies completed and results released in February 2016
- Completed and announced results of the feasibility study for stage 1 and the prefeasibility study for stage 2 of the Golpu project.

Maiden inferred resource declared for Kili Teke prospect

- Drilling at Kili Teke continues to yield highly significant gold-copper mineralisation drill results.

WHY THIS IS MATERIAL TO HARMONY

Sustaining and growing production is key to our long-term strategy. Our current resources are finite and it is essential to have a project pipeline that balances early-stage and more immediate prospects so as to meet future targets. In addition to production, we need to diversify our resource base in order to mitigate our exposure to the counter-cyclical nature of the gold industry.

OUR APPROACH

Our exploration programme, like our operations, is focused in South Africa and Papua New Guinea. As these are prospective areas and we already have knowledge of the local geology, government, infrastructure and regulations of these countries, it makes sense to take advantage of this as we expand our project pipeline.

Our exploration strategy targets significant prospective geological regions to discover large long-life gold and gold-copper ore bodies that will allow us to create value for years to come. We aim to create a balanced brownfields and greenfields exploration portfolio.

Brownfields exploration allows us to maximise value from existing infrastructure by developing mineral resources that sustain our operations. Greenfields exploration, on the other hand, allows us to create new opportunities in highly prospective under-explored mineral provinces and emerging gold districts.

Our flexible approach to potential exploration projects includes joint ventures, acquisitions and other arrangements. However, all projects undergo a robust assessment to determine whether they meet our exploration standards. Criteria include project- and country-related risk profiles, and minimum requirements on the potential size, production profile and investment targets.

In particular, we seek exploration projects that align with our operational imperatives of prioritising safety, maximising in-ground expenditure and drill testing high-priority targets. In this way we can ensure that future projects, once operational, will enable us to meet our long-term strategic objectives.

Harmony closely monitors the environment for new opportunities to enhance our project portfolio, in line with core operating capabilities. Given sustained low commodity prices, tenure over highly prospective target areas in Papua New Guinea continues to become available.

ACTIONS IN 2016

In FY16, we spent R433 million (US$29.9 million) (FY15: R385 million, US$33.6 million) on both brownfields and greenfields exploration, all of which was spent in Papua New Guinea.

In line with our strategy of developing a world-class copper and gold portfolio in Papua New Guinea, the key work streams underpinning the FY16 exploration programme included:

- Optimised feasibility studies on a staged development path for the high-grade Golpu porphyry gold-copper deposit, and special mining lease permitting process
- Accelerated drill schedule at the Kili Teke porphyry gold-copper discovery to define resources and progress up the value curve
- Drill target development for epithermal gold at the Wau Domefield in the Morobe province
- Continued rationalisation of the greenfield tenement package to maintain focus on the most prospective targets.

KEY GEOLOGICAL FEATURES

Papua New Guinea

The central belt of rocks making up the highland spine of Papua New Guinea formed as a result of subduction-related interaction and convergence between the Pacific plate (in the north), and the Australian plate (in the south). Deposits typical of subduction-related arc settings include:

- Epithermal gold deposits which form at shallow depths, relatively close to the earth's surface, examples of which include Hidden Valley, Hamata, Kerimenge, Wau and Wafi
- Porphyry gold-copper systems which form at deeper levels in the crust associated with the emplacement of intrusive stocks and dykes. Porphyry systems are one of the largest sources of copper ore in the world, and can also contain significant amounts of gold, molybdenum and silver as by-products. Golpu is a high-grade porphyry gold-copper system

Harmony has advanced a number of gold and gold-copper prospects which are at various stages of exploration and evaluation across Harmony's lease areas in Papua New Guinea. These include the Kili Teke prospect.

South Africa

Our underground mines are all located in the Witwatersrand Supergroup. Most are in the south-western corner of the Witwatersrand Basin or Free State goldfields, which comprise sedimentary rocks that extend laterally for hundreds of kilometres into the West Rand goldfields and East Rand Basin. An open pit operation is located on the Kraaipan Greenstone Belt in the north-west of the country.

PAPUA NEW GUINEA

Papua New Guinea is one of the world's most prospective yet under-explored terrains for porphyry gold-copper and epithermal gold mineralisation. The New Guinea mobile belt which spans the core of the Irian Jaya-Papua New Guinea mainland, is host to a number of world-class porphyry gold-copper and gold deposits including Golpu (Cu-Au), Ok Tedi (Cu-Au), Grasberg (Cu-Au), and Porgera (Au). Harmony began actively exploring in Papua New Guinea in 2003. We have developed a small but high-quality project portfolio, both in established mineral provinces and in emerging gold and copper districts.

The case for exploration investment in Papua New Guinea remains strong. The country is hugely prospective, under-explored, and has a stable and transparent regulatory environment that promotes and supports mining investment. In addition, Harmony has an established track record of discovery and adding value through cost effective exploration:

- Since 2003, resource growth from both the Morobe joint venture tenements (Harmony's 50% equity share) and Harmony's 100%-held tenements amounts to 12.7Moz of gold and 5.1Mt of copper (42.5Moz gold equivalent)
- Discovery cost on a per ounce gold equivalent basis of less than US$10 is among the best in the world

Morobe Exploration Joint Venture (50%)

The Morobe Exploration Joint Venture refers to a key strategic tenement holding in the Morobe Province that encompasses the Hidden Valley mine[1] and Golpu project. The tenement package is held jointly (50:50) between Harmony and Newcrest. The Morobe exploration strategy is to manage a portfolio pipeline of projects to develop bulk tonnage (~1Moz) or high-margin gold or gold-copper targets that provide new standalone opportunities or resource options to complement the operations at Hidden Valley and/or at the Golpu project.

During FY16, we spent R9 million (US$0.6 million) compared to R12 million (US$1.1 million) in FY15 on exploration in the area throughout the joint venture. This represents Harmony's share which is 50% of the total work programme expenditure. The Morobe Exploration Joint Venture tenement package currently stands at 999km^2 (FY15: 1 245km^2). Work on the Morobe Exploration Joint Venture tenements included:

- Rationalisation of peripheral and non-core tenements:
  - EL1590 was surrendered after prospectivity was downgraded
  - EL1629 is now managed by Pacific Niugini Minerals under an option and sale purchase agreement
- Prospect development at the historic Wau gold mining centre located approximately 12km northeast of Hidden Valley and reassessment of drill targets and potential at Wafi Golpu

A reduced budget of R6 million (US$0.4 million) has been proposed for FY17 to continue the generative work programme planned to develop quality targets with the potential to provide resource optionality and leverage infrastructure associated with operations at Hidden Valley or the Golpu project.

The Papua New Guinea exploration and mine development programme is summarised below:		
Golpu		
Target	**Progress in FY16**	**Targets/plans for FY17**
Develop the Golpu deposit, a world-class gold-copper porphyry resource, into a mine with more than 28 years of low-cost copper and gold production.	Completed and announced the results for the prefeasibility and feasibility studies For more detailed information, see Wafi Golpu	Stakeholder engagement to initiate the permitting process: Compilation and submission of the special mining lease application including Environmental Impact Statement2 Optimisation and de-risking studies Deep-sea tailings placement studies
Wafi Golpu district		
Target	**Progress in FY16**	**Targets/plans for FY17**
Wafi transfer zone – greenfields exploration targeting discovery of additional resources to expand Golpu into a mineral district	Validation mapping and reconnaissance has confirmed Nambonga North as a priority drill target for FY17 Prospectivity of EL1590 was downgraded and the tenement was surrendered	Continue generative work programme and drill target development: Airborne geophysical survey trial over the Wafi Golpu system Reinterpretation of the Wafi gold system in context with latest structural model and geophysical data
Hidden Valley district		
Target	**Progress in FY16**	**Targets/plans for FY17**
Brownfields exploration within a 10km radius of the Hidden Valley plant to develop replacement resources and support expansion	Grassroots level work focused on the historic Wau gold mining centre with detailed mapping and rock chip sampling and grid based soil geochemical sampling completed. In total, 1 082 surface samples were collected A number of high tenor gold geochemical anomalies were generated for developing into drill targets	Drill target definition and drill testing of high-priority targets in the historic Wau mining district

Harmony Gold Exploration (Papua New Guinea) Limited (100%)

A total of R164 million (US$11.3 million) was spent on exploration outside of the Morobe joint venture on Harmony-owned projects in FY16 (FY15: R87 million/US$7.5 million). This work focused almost exclusively on developing and drill testing the Kili Teke prospect.

Harmony's 100%-owned greenfields tenement portfolio comprises 764km^2 compared to FY15: 1 023 km^2 (a 25% reduction in the size of the tenement portfolio year-on-year). The reduction in the tenement holding was driven by relinquishing part of EL2310, which was required as part of the licence renewal process.

Details of the FY16 work programme are outlined below. Drilling was successful in defining a maiden resource for Kili Teke, which now stands at 785 000t of copper, and 1.8Moz of gold, and the Kili Teke prospect has been proven as a new porphyry camp with the potential to develop into a major gold-copper discovery.

Subject to further drilling success, a FY17 budget of R227 million (US$17.6 million) has been earmarked to expand the resource base and progress "pre-concept" studies of the Kili Teke mineralisation.

Kili Teke prospect		
Target	**Progress in FY16**	**Targets/plans for FY17**
Targeting gold-copper porphyry	18 400m of drilling was completed during the year 128Mt maiden resource declared in November 2015. In June 2016 the inferred mineral resource increased to 222Mt @ 0.35% Cu, 0.25g/t gold and 170 ppm molybdenum containing 782 000t copper, 1.75Moz of gold and 38 000t molybdenum	Drilling to continue for resource expansion (open to southeast and at depth). A budget of R227 million (US$17.6 million) has been earmarked Pre-concept study work to begin
Project generation		
Target	**Progress in FY16**	**Targets/plans for FY17**
Develop a project pipeline capable of delivering additional quality resources to sustain growth and regional operations	EL2836 containing the Poru prospect area was progressed to grant and preliminary social mapping began Tenement monitoring for new opportunities continued	Prospect identification and development through ridge and spur soil sampling, mapping and rock-chip sampling

KILI TEKE PROSPECT – A SIGNIFICANT NEW GREENFIELD PORPHYRY COPPER DISCOVERY

Kili Teke represents the first greenfield porphyry gold-copper discovery in Papua New Guinea since Golpu, which was identified in 1990 and then materially expanded some 20 years later in 2010. Harmony's exploration team has played an integral role in both discoveries.

Regionally, the Kili Teke copper gold prospect is hosted in the Papuan fold belt which comprises the same limestone-sedimentary sequence that is host to the giant Ok Tedi and Grasberg gold-copper mines. Harmony is actively exploring the region for similar major porphyry gold-copper systems together with accompanying high-grade, gold-copper skarn mineralisation.

In following up historic exploration results in FY15, Harmony defined a broad (kilometre scale), high-tenor gold-copper anomaly at Kili Teke, indicative of the zonal geochemical distribution and alteration footprint associated with a major mineralised porphyry gold-copper system. Initial drilling began in November 2014 and was highly successful.

FY16 drilling comprised 26 holes for 18 400m and focused on infilling and extending the discovery mineralisation in the Central Mineralised Porphyry. A maiden mineral resource announced in November 2015 was subsequently revised in June 2016. The updated resource was grown 50% to 6.0Moz on a gold equivalent basis compared to the November 2015 model.

November 2015 – initial intercepts

KTDD007: 461m @ 0.51% Cu, 0.4 g/t Au, from 86m, Including 202m @ 0.74% Cu, 0.57g/t Au, from 137m

KTDD013: 542m @ 0.58% Cu, 0.41 g/t Au from 90m, Including 319m @ 0.79% Cu, 0.57 g/t Au from 166m

June 2016 – revised mineral resource

The inferred mineral resource currently stands at 222Mt @ 0.4% copper and 0.2g/t gold and 170ppm molybdenum containing:

- 782 000t copper
- 1.75Moz gold
- 38 000t molybdenum

The additional drill data has led to an improved understanding of the geological model and the mineralised system. Cross-cutting relationships identified through detailed logging show that the gold-copper mineralisation is associated with a multiphase intrusive complex. Two early-mineral porphyry phases have been identified as the main host to the higher grade and more well developed stockwork mineralisation. Uranium-lead zircon age dating yield Pliocene age dates in the range of 3.5 ± 0.04Ma (million years) to 3.59 ± 0.07Ma for the mineralised phases. Late-mineral porphyry phases were also identified in the drilling and impact grade continuity within the deposit where they intrude and stope out the earlier more mineralised phases.

The Kili Teke deposit remains open to the southeast and at depth down plunge and drilling at the prospect continues targeting:

- Zones of skarn mineralisation within and around the main intrusive complex. Skarn mineralisation has not yet been included in the model. These have the potential to develop into high-grade massive sulphide lodes which could be selectively mined provided grade continuity and size (tonnage) can be established. KTDD025 for example intersected: 7.8m @ 12.98% Cu, 11.45 g/t Au from 920.5m
- The deposit remains open at depth where trends in the copper-sulphur ratios suggest higher-grade (bornite) stockwork mineralisation may be developed
- The deposit remains open to the southeast under cover of the limestone cap. Further drilling to scope out the full extent of the intrusive complex is planned
- Additional intrusive centres with mineralisation outside of the current resource area; potentially driving marbleisation intersected at the Gold Ridge Anomaly or the intense alteration and accompanying sulphides evident at the Transfer Zone Porphyry target

Kili Teke deposit

Overall the geometry of the deposit remains as a relatively steeply plunging, pipe-like intrusive complex, with mineralization decreasing away from the central high-grade stockwork zones of copper gold mineralisation. Intense marbleisation and skarn mineralisation is developed around the peripheral contact with the host sequence. Variably developed skarn mineralisation also occurs along internal structural and contact zones.

Kili Teke infrastructure, scoping and desktop concepts

Kili Teke is located on EL2310, some 50km north-northwest of the Tari Township (which is the provincial capital of the Hela Province in the Highlands of Papua New Guinea) and approximately 40km west-northwest of Porgera. The nearest road access point, which connects through to the Highlands Highway at Tari is approximately 14km from the Kili Teke prospect.

Pre-concept study work has confirmed technically-viable solutions exist for mining, processing, infrastructure and logistics at Kili Teke, and no fatal flaws were identified. The gold-copper mineral resource at Kili Teke extends to surface and would lend itself to an open-pit operation. First pass rougher kinetic test work for metallurgical recovery shows that copper recovers extremely well (90%) and gold recovers well (65%). Further deposit concept and study work is planned for FY17 in conjunction with the drill programme.

The Hela Province and the Tari area in particular are currently undergoing a major infrastructure upgrade following on from the national liquefied natural gas project development. The Papua New Guinea government recently announced funding for several significant infrastructure projects including the sealing of the roads between Komo, Tari, Koroba and Mendi, and a major upgrade of the Hides gas-fired power plant and rural electrification programme. The Hides power plant supplies electricity to the Porgera gold mine. The Komo airstrip, located approximately 80km south of Kili Teke, is the largest sealed airstrip in the country and is capable of taking large cargo planes.

WAFI GOLPU – A ROBUST INVESTMENT CASE

Harmony and Newcrest each currently own 50% of Golpu through the Wafi Golpu Joint Venture. The Golpu deposit is located approximately 65km southwest of Lae in the Morobe Province of Papua New Guinea which is the second largest city in Papua New Guinea and will host Golpu's import and export facilities. The proposed mine site sits at an elevation of approximately 400m above sea level in moderately hilly terrain and is located near the Watut River, approximately 30km upstream from the confluence of the Watut and Markham rivers

In February 2016, the Wafi Golpu joint venture completed feasibility and prefeasibility studies for the Wafi Golpu gold-copper project and declared updated resources and reserves for the project. Both studies confirmed a robust investment case – one that supports proceeding with the project.

The initial project capital on a 100% basis is estimated at US$2.6 billion, yielding an internal rate of return of 16%. These feasibility study outcomes justify the development of twin exploration access declines, with two proposed block caves (BC 1 and BC 2) designed to extract approximately 50% of the contained metal (gold and copper) of the Golpu reserve. The remaining reserve is to be extracted by a deeper third block cave (BC 3) which is the subject of the prefeasibility study. The common path mining and processing infrastructure, as defined in the feasibility study, will be used in support of project optimisation, expansion and extended mine life as described in the prefeasibility study.

FEASIBILITY STUDY

The feasibility study defines initial development of the Golpu resource and focuses on the development of the first two block caves, and all associated infrastructure required. The key findings of the feasibility study include:

- Low operating costs will withstand low commodity price cycles and will benefit from high returns during higher commodity price cycles
- The updated ore reserve at 31 December 2015, is estimated to contain 5.5Moz of gold and 2.4Mt of copper (Harmony's 50% interest)
- Project de-risked, with no significant deviation from the previous prefeasibility study economic outcomes and technical recommendations
- Golpu is amenable to "staged development"
    - allows for optimising capital efficiency
    - progressively de-risks the project prior to further investments
- Financial metrics include (the feasibility study is considered to be at ±15% accuracy)
    - net present value: US$1.1 billion

- internal rate of return: ~16%
- maximum negative free cash flow (100% basis): US$1.8 billion

- Initial mine development targets higher-grade sections of the deposit thereby optimising free cash flow
- Development of the near-surface block cave 1 affords early cash flow thereby reducing the maximum negative cash outflow
- Production parameters for the two block caves are:

	Annual mining rate	Tonnes mined	Gold grade	Copper grade
Block cave	(Mt)	(Mt)	(g/t)	(%)
Block cave 1	3.0	8	0.99	2.00
Block cave 2	6.0	143	1.05	1.54

- Block caving is the preferred mining method for the following reasons:
  - ore body geometry and indicative rock mass characteristics are suited to block caving
  - it is a high productivity, low operating cost underground mining method
- The project is in close proximity to the city of Lae with established infrastructure such as roads, marine port, airport, and light industry

Summary of the key metrics (100% basis) of the feasibility study:

Area	Measure	Unit	Results
Production	First ore milled	Months from start of earthworks	~60
	Steady-state production	Months from start of earthworks	~90
	Ore mined and milled	Mt	149
	Life of mine	Years	28
Copper	Metal produced	Mt	2.2
	Peak annual copper production	000t pa	135
	Copper recoveries	%	94
Gold	Gold metal produced	Moz	3.6
	Peak annual gold production	000oz	297
	Gold recoveries	%	70
Capital	Project capital	US$ billion	2.6
	Sustaining capital	US$ billion	1.6
	Total life of project capital	US$ billion	4.2
	Maximum negative cash flow	US$ billion	1.8
Operating costs	Total operating cost (real)	US$/t	30.66
	Realisation cost	US$/t	17.61
	Cash cost	US$/lb produced	0.59
	Total sustaining production cost	US$/lb produced	0.89
	Total production cost	US$/lb produced	1.45
Economic assumptions	Gold price	US$/oz	1 200
	Copper price	US$/lb	3.00
	Exchange rates	AU$/US$	0.80
		PGK/US$	2.85
	Discount rate (real)	%	8.50
Financial outcomes	Net present value	US$ billion	1.1
	Internal rate of return	%	~16

The operating cost estimate covers all operating expenditure to mine, treat and administer extraction of the ore body, as well as transporting, dewatering and ship-loading of the concentrate at the port of Lae. Cash costs and total production costs include treatment and refining charges, freight to end customers, royalties and mining levies. Total production cost includes sustaining and construction capital costs. The realisation cost estimate in the financial model is US$17.61/t, this includes treatment and refinery costs, concentrate transport and handling costs, and royalties and is not included in the total operating cost. Any real, above inflation, price escalation of costs to the time of forecast expenditure has been excluded. Costs are however sourced and forecast in the underlying currency in which they are incurred.

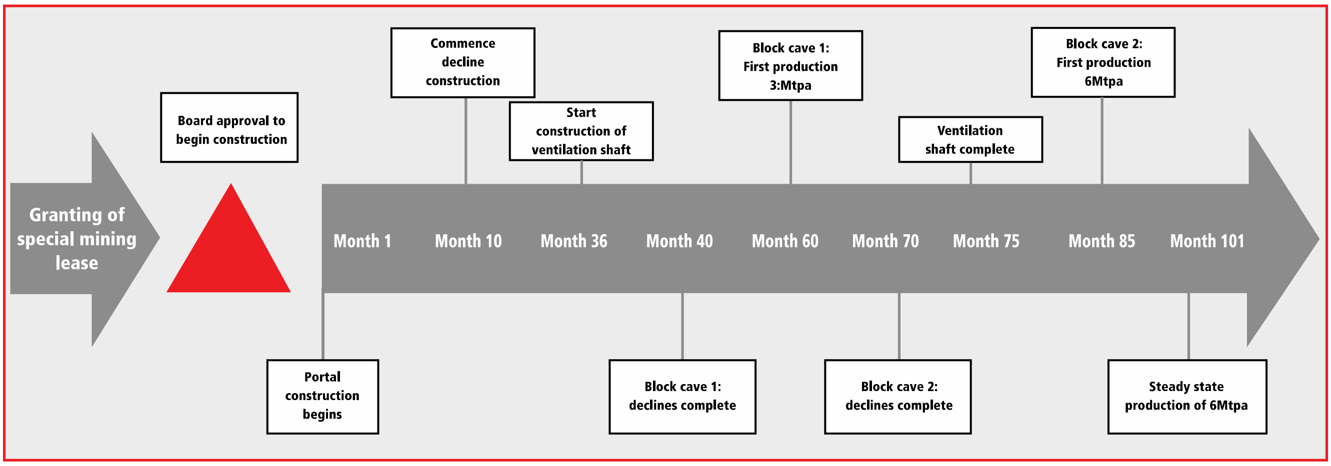
Capital costs

Harmony's share (50%) of the estimated capital requirements (based on the feasibility study) from grant of the special mining lease are approximately as follows:

No Government° buy-in (Harmony 50%)			**Government° buy-in (Harmony 35%)**		
	Project cash flow (incl capital expenditure)		Year	Project cash flow (incl capital expenditure)	
Year	US$m			US$m	
FY17 and FY18	*		FY17 and FY18	*	
FY19	(115)		FY19	37	Grant of special mining lease and Government buys 30% for US$235m
FY20	(115)		FY20	(81)	
FY21	(145)	External funding of US$25m required	FY21	(102)	
FY22	(260)		FY22	(182)	
FY23	(240)		FY23	(168)	
Total	**(875)**		**Total**	**(496)**	

° *Government of Papua New Guinea*
* *Insignificant expenditure up to granting of the special mining lease. The above funding requirements are based on the project permitting timeline with on-the-ground activities only commencing post grant of a special mining lease in FY19*

Wafi Golpu: Development timeline



Community engagement

Engagement with key stakeholders, including the Papua New Guinea national government, the Morobe provincial government, landowners and community representatives continues so as to ensure clear alignment on the project objectives. In parallel with further technical studies and project definition, the local communities will be actively engaged and appraised of the project development roadmap and next steps. The three major communities involved are the Hengambu, Yanta and Babuaf, spread over 15 villages in the region. The local communities remain supportive of the project.

Further work on the feasibility study

The following areas will be the focus of further assessment to optimise the study outcomes and the incorporation of additional data which will be collected in the next study phase.

Access declines: Declines towards the ore body affording drilling platforms are required in order to verify geotechnical and hydrological interpretations of the ore body at depth.

Geotechnical interpretation: Further underground drilling and mapping work is required to confirm assumptions of the rock mass characteristics in each block cave and the rock mass response to the changing stress regime.

Tailings management: Further assessment of tailings disposal options including the potential for deep-sea tailings placement, which could result in a decrease in capital expenditure.

Hydrology: The management of water will be central to the success of the mining operation, primarily due to the nature of the geological environment of the project site. Further investigation and modelling of water will focus on increasing the confidence in the geohydrology model by obtaining additional data from drilling campaigns, modelling the effectiveness of a dewatering bore field around the block cave subsidence zone, and streamflow and surface hydrology modelling and management.

Permitting and environmental approvals: Work will continue with the Papua New Guinea Government to obtain statutory environmental approvals and other regulatory permits for the project.

Port and power: Further assessment of optimal arrangements for port facilities and power supply.

PREFEASIBILITY STUDY

The prefeasibility study was conducted in parallel to the feasibility study. The first optimisation step looked at debottlenecking the 6Mtpa capacity from block cave 2. The debottlenecking increased the production capacity to 7Mtpa by making minor and low cost modifications to the process plant grinding circuit and the underground material handling system.

The access declines to the block caves in both the feasibility study and prefeasibility study were treated as common path access embedding optionality and flexibility in the designs to scale the operation up with a relatively low capital investment in response to increasing commodity prices.

The second optimisation step was increasing the mine's production rate. By optimising all existing feasibility study infrastructure and increasing the size of the underground loader fleet, a higher mining production output from block cave 2 can be achieved, without a significant capital investment. A second process plant with a capacity of 7Mtpa would be constructed to bring total plant capacity to 14Mtpa.

The third and final optimisation investigated by the prefeasibility study was to extend the life of the operation with the construction of a third block cave below the second block cave. Additional capital is required to extend the decline access and conveyor belt system, the ventilation system and establish the associated underground infrastructure.

Summary of the key metrics (100% basis) of the prefeasibility study:

		Feasibility study	Prefeasibility study1		
Description	Unit		Step 1	Step 2	Step 3
Financials					
Net present value	US$ million (real)	1 087	1 240	1 338	1 954
Internal rate of return	%	15.6	16.3	16.8	17.5
Maximum negative cash flow (real)	US$ million	1 763	1 763	1 763	1 763
Free cash flow generation (annual real – steady state average)	US$ million	249	298	405	402
Schedule					
Maximum annual ore throughput	Mt	6	7	14	14
Life of mine	years	28	25	18	35
Production					
Ore mined	Mt	149	153	155	379
Copper					
Average grade	%	1.58	1.58	1.57	1.26
Total recovered	000t	2 233	2 301	2 306	4 547
Annual average recovered over life of mine	000t	80	92	128	130
Gold					
Average grade	g/t	1.06	1.06	1.05	0.91
Total recovered	000oz	3 573	3 527	3 509	7 058
Annual average recovered over life of mine	000oz	128	141	195	202
Capital expenses[2]					
Project capital	US$ millions (real)	2 640	2 656	2 656	2 656
Expansion capital	US$ millions (real)	–	10	572	1 261
Sustaining and expansion capital	US$ millions (real)	1 551	1 499	2 175	3 725
Operating expenses[2]					
Total operating cost	US$/t ore milled	30.66	28.12	24.16	23.95

		Feasibility study	Prefeasibility study1		
Description	Unit		Step 1	Step 2	Step 3
Cash cost	US$/lb Cu real (life-of-mine average)	0.59	0.55	0.44	0.60

[1] *All prefeasibility study outcomes are shown on a life-of-mine basis*
[2] *Costs are based on 2016 real estimates*

DEVELOPMENTS SUBSEQUENT TO YEAR-END

In August 2016, an application for a special mining lease for the Wafi Golpu project was submitted to the Mineral Resources Authority in Papua New Guinea. Submission of this application follows reviews of the project feasibility study project by the boards of directors of both Harmony and Newcrest and brings the project one step closer to realising more value for Golpu.

Work to optimise the outcome of the studies and to incorporate additional data continues. Further project development will be subject to the granting of the special mining lease, the obtaining of all necessary permits, approvals and agreements and, ultimately, approval by the boards of both Harmony and Newcrest.

SOUTH AFRICA

BROWNFIELDS EXPLORATION

A summary of brownfields exploration conducted in South Africa in FY16 and planned for FY17:

Tshepong B Reef		
Target	**Progress in FY16**	**Targets/plans for FY17**
Continuation of B Reef exploration to maintain current levels of B Reef mining. Drilling to identify areas of economic value in the down dip extensions of the B Reef channels currently being mined	Geological interpretation has been completed, drilling platforms have been identified and drilling schedules established to confirm the down dip extensions of the B Reef channels identified in the Leeubosch, Midas and Horizon dyke areas	Drilling will begin from six new areas on four levels at Tshepong
Phakisa B Reef		
Target	**Progress in FY16**	**Targets/plans for FY17**
Currently, the B Reef is not being mined. Exploration drilling to be undertaken to identify areas of economic value in the down dip extensions of the channels being mined at neighbouring Tshepong. Significant potential may exist to mine the B Reef north of the shaft pillar on Phakisa	Geological interpretation has been completed, drilling platforms have been identified and drilling schedules established to confirm the B Reef channel to the north of the Zindaba Dyke	Drilling will begin from levels 69 to 75 north of the Zindaba Dyke from the 65 line northwards
Doornkop Main Reef		
Target	**Progress in FY16**	**Targets/plans for FY17**
Drilling for Main Reef that is located 60-70m below the current economic South Reef and is classified as a minor reef that can be explored and mined utilising most of the current South Reef infrastructure	Geological interpretation has been done, drilling platforms have been identified and drilling schedules established to confirm the Main Reef channel	Drilling to begin from four drilling platforms on 197 level (13 holes have been planned)
Doornkop South Reef		
Target	**Progress in FY16**	**Targets/plans for FY17**
Current South Reef structural model in the inferred areas is based on that of the Kimberly Reef, which lies stratigraphically 800m above the South Reef. Drilling of long-incline boreholes will be done to assist with modelling of the South Reef on levels 202, 207 and 212	Geological interpretation has been done, drilling platforms have been identified and drilling schedules established to confirm the levels where South Reef can be mined	Drilling will begin from seven different platforms to confirm the presence of the South Reef on levels 202, 207 and 212
Doornkop seismic study		
Target	**Progress in FY16**	**Targets/plans for FY17**
Currently, our South Reef structural model is based on that for the Kimberly Reef, which lies stratigraphically 800m above the South Reef. The seismic survey will identify and locate major geological structures and South Reef levels	Geological interpretation has been conducted, traversing survey lines have been identified and schedules established to confirm major geological structures as well as those levels where the South Reef can be mined	The seismic survey, which consists of nine lines and 72 line kilometres of traversing, aims to cut across major structures within the mine boundary to enable us to determine the extent of these major structures and potential production levels

Kalgold		
Target	**Progress in FY16**	**Targets/plans for FY17**
Three potential mineralised zones have been identified south of the D Zone pit	Geological interpretation has been done and drilling traverses planned	Reverse circulation drilling traverses will be drilled at the potential targets (38 boreholes have been planned)
Harmony-White Rivers Exploration joint venture		
Target	**Progress in FY16**	**Targets/plans for FY17**
The main objective of this exploration joint venture is to explore and develop potential gold resources at White Rivers Exploration (Pty) Limited's Beisa Project and abutting exploration areas within Harmony's adjacent Target complex	In terms of the agreement, White Rivers and Harmony (through Loraine Gold Mines Limited and Avgold Limited) will have initial and fixed interests of 65% and 35% respectively in the exploration joint venture. White Rivers will fund and manage exploration activities to prefeasibility study level. Initial exploration activities, which include collation of historical data, interpretation and verification of data, and geological modelling, are in progress. The initial resource in the project area has been identified and the scoping study has been carried out.	Good progress is being made and an initial resource is expected to be declared during FY17 Underground exploration drilling is planned but would require rehabilitation of the underground access area The prefeasibility study is to begin once exploration results become available

Projects
A summary of projects currently underway in South Africa in FY16 is as follows

Joel North

Target	Progress in FY16	Targets/plans for FY17
Mining down to 137 level	Infrastructural development on 129 level was completed and the declines have reached 137 level. Equipping of the conveyor decline has begun from 137 level up towards 129 level	Completion of capital development on 137 level, the twin declines and the installation of the permanent conveyor

Tailings retreatment expansion

Target	Progress in FY16	Targets/plans for FY17
Retreatment of additional tailings in the Free State	Initial water study completed. Investigated retreatment of a further 1Mt of tailings per month	Completion of prefeasibility and feasibility studies

Central plant tailings reclamation

Target	Progress in FY16	Targets/plans for FY17
Reclaim material from FSS5 tailings facility for processing at the central plant (to be converted for tailings re-treatment) at a rate of 300 000t annually. Central plant operation will be similar to the highly profitable Phoenix operation, which has been in operation since 2007	Capital for this project was approved towards the end of the financial year and implementation has begun	Complete implementation of project by end of the financial year

CORPORATE GOVERNANCE

THE VALUE OF GOOD CORPORATE GOVERNANCE

Harmony's corporate governance framework and processes are aimed at fulfilling the company's obligations to all stakeholders. These obligations are the foundation both of our strategy and of our values, and are inseparable from our practice of corporate governance.

Harmony's board is tasked with making the decisions necessary to shape the strategy and to guide the company in attaining its strategic goals. We thus seek particular skills in our board members to enable them to contribute meaningfully to the company. These skills include knowledge of the South African gold mining industry as well as the local and international economy, financial and/or mining expertise, an understanding of socio-economic expectations and knowledge of the legislation and regulations in the jurisdictions in which we operate.

Harmony's values are entrenched in our codes of conduct and behaviour and underpin not only our approach to corporate governance but everything we do, and every decision that we make. Moreover, our board members live our values and lead by example by making decisions that are in line with our values. Leadership, strategy and our values are interdependent and our approach to corporate governance seeks to ensure this.

Each quarter, the board, through the audit and risk committee, reviews the company's risks and operational, financial and sustainability performances, and relates these back to strategy at the annual strategy session.

OUR APPROACH TO CORPORATE GOVERNANCE

Governance practices and reporting

The foundation of our corporate governance is compliance with the Companies Act, the requirements of the JSE Limited, where we have our primary listing, and the New York Stock Exchange as well as the King Report on Governance for South Africa and the King Code of Governance Principles (King III) and related principles of good corporate governance. Harmony also complies voluntarily with the principles of the United Nations Global Compact, International Council on Mining and Metals, the Global Reporting Initiative and the Cyanide Code.

In line with the JSE Listings Requirements, we continue to apply the principles of King III. A detailed King III compliance register can be found on our website at www.harmony.co.za.

New York Stock Exchange foreign private issuers, such as Harmony, must briefly highlight any significant ways in which their corporate governance practices differ from those followed by United States domestic companies subject to the listing standards of the New York Stock Exchange. A brief summary of the significant differences can be found in our 2016 Form 20-F filed with the United States Securities and Exchange Commission on our website at www.harmony.co.za/investors/reporting/20f.

Our governance structures and processes are reviewed regularly and adapted when necessary to reflect what is happening internally in Harmony, as well as to keep up with national and international best practice.

Board leadership

We have paid specific attention to the composition of our board to ensure a balance of power. Harmony has a unitary board comprising executive and non-executive directors with a majority of independent non-executive directors.

On the recommendation of the nomination committee and in terms of the King III requirement, the board was evaluated and the classification confirmed of all independent non-executive directors. This includes directors serving on the board for longer than nine years.

The roles of the chairman and chief executive officer are distinct and separate, as governed by the board's terms of reference and delegation of authority framework.

Our chairman, Patrice Motsepe, was appointed based on the value he adds to Harmony in this role, given the vital skills he has. Patrice has served on our board since 2003 and was most recently re-elected as chairman in August 2016. In terms of our succession plan, the chairman is currently supported by a deputy chairman, Modise Motloba, who has held this position since August 2012. As determined in accordance with King III, Patrice is considered to be a non-independent, non-executive director.

As a result, Fikile De Buck was re-appointed by the board as our lead independent non-executive director in August 2016. Her role is in line with the recommendations of King III and she assists the board in managing any actual or perceived conflicts of interests that may arise from the non-independence of the chairman. Mavuso Msimang was appointed deputy lead independent non-executive director on 5 May 2014.

For more on the members of our board, see Board of Directors in this report.

Appointment of directors

The responsibility for board appointments lies with the nomination committee, which recommends all new board appointments and reviews succession plans for directors and management. In line with King III, the board chairman is a member of this committee. The procedures governing appointments are formal and transparent. While the nomination committee recommends individuals as members of the board, the appointment of board members is considered by the board as a whole, in accordance with its terms of reference. These appointments are, in turn, approved by shareholders.

When making new appointments to the board, Harmony considers the following factors: skills; experience, gender and demographics. We are satisfied that we currently have an acceptable balance of members and that our non-executive and independent directors have sufficient experience and knowledge among them to carry significant weight in the board's decision-making process.

Board induction and training

Once appointed, directors undergo the company's board induction programme. Managed by the company secretary, this programme provides new board members with comprehensive company information and governance packs. It also offers directors the opportunity to meet with various management teams and to tour the business. No new directors were appointed during the year.

A formal training-needs analysis is conducted annually to ensure board members are appropriately trained, with ad hoc training opportunities identified during the year. Formal training on relevant topics is given at each board meeting, while the company secretary provides board members with regular updates on regulatory and industry developments. Our board also took time to visit our operations and community projects during the year.

Board responsibilities

The board responsibilities are carried out with the company's best interests in mind. Our board receives sufficient information to ensure objective decision-making, and is expected to act rationally at all times. Our code of conduct enshrines behaviour that puts the best interests of Harmony ahead of those of individuals. The code of conduct is available at www.harmony.co.za/sustainability/governance#policies.

One of the board's primary functions is to establish management structures and processes that assist in maintaining the sustainability of our business in terms of our financial, social and environmental performance. The board and its committees have work plans in place that allow them to address their responsibilities adequately throughout the year. These work plans are reviewed and confirmed quarterly.

Responsible citizenship is core to the company and, through the social and ethics committee, the board ensures we remain a committed, socially responsible corporate citizen. One of the ways in which the board ensures Harmony is a good corporate citizen is by considering and responding to the legitimate expectations of stakeholders. This requires a careful balance between promoting our business interests and protecting our stakeholder relations – it is essential that Harmony remains profitable in order to be able to share these profits with stakeholders. The social and ethics committee receives quarterly reports on stakeholder engagement, which it uses to monitor progress and provide feedback to the board. In addition, the board is kept informed of shareholder perceptions after roadshows and other shareholder engagements (refer to the Material Issues and Stakeholder Engagement section).

To sustain our business, we need to ensure our balance sheet remains strong and flexible. The board undertakes quarterly reviews of our financial performance, while the executive management team reviews our operational results on a weekly basis. If the company were found to be in financial distress, the board would consider what mechanisms would be appropriate to address this. Ordinarily, the board uses these quarterly reviews to perform solvency and liquidity tests to support the going concern statement, in line with the provisions of the Companies Act.

In line with the International Integrated Reporting Council guidelines, the board reviews and approves this integrated report as part of its annual duties. The audit and risk committee makes a final recommendation to the board for consideration.

The board monitors the performance of the chief executive officer. The board also evaluates succession plans for the chief executive officer and executive management annually to ensure a continuation of skills and expertise for the future.

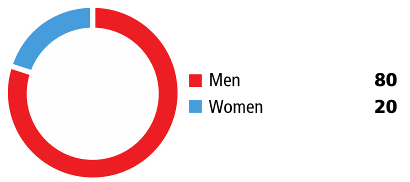
Composition and skills

We have paid specific attention to the composition of our board to ensure that it reflects our objectives and that board members have the skills and expertise necessary to contribute to the sustainability of our company. Three of Harmony's non-executive directors are women and nine directors are considered to be historically disadvantaged South Africans to give representation by this grouping of almost 60%, thus exceeding the 2014 Mining Charter requirement that 40% of the board comprise historically disadvantaged South Africans.

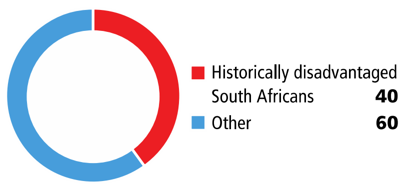
Critical to the achievement of our strategy is ensuring the company consists of teams with the skills and vision necessary to achieve our strategic targets. The board is no exception – it is made up of individuals who understand our industry, our sector and our strategy. The skills of the members of the board includes expertise in local and international mining, geology and mining technology, social and environmental compliance, strategic and project management expertise, law and investment, stakeholder management and human resources.

Board composition

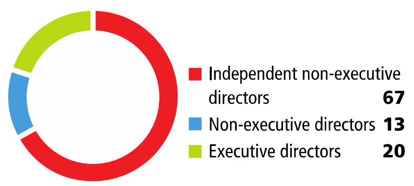
By gender (%)



By historically disadvantaged South Africans (%)



By director (%)



NOTEWORTHY ACTION – BUILDING RELATIONSHIPS WITH STAKEHOLDERS

The board interacts with many of our key stakeholders during the course of the year. This, we believe, is important – our relationships are central to our business and our strategy. Insight into these relationships improve board members' ability to fulfil their roles appropriately.

During FY16, the board spent time with our employees during site visits to the operations, which included visits to Papua New Guinea, Kusasalethu, Joel, Tshepong/Phakisa and a discussion on sustainable mining at Kalgold.

In addition, the chief executive officer and financial director had direct contact with investors through road shows, while the board interacted with shareholders at the annual general meeting. The chief executive officer and executive managers continuously engage with the greater industry through the Chamber of Mines and various forums/meetings.

Board committees

In order to focus on our priorities, particular responsibilities have been delegated to board committees in terms of the board delegation of authority and the committees' terms of reference. The board does not abdicate its overall responsibility but rather the work done by these committees serves to support the board in executing its responsibility. At each board meeting, the committee chairmen report on the activities of their respective committees and make recommendations on key decisions. Some duties are further delegated to the chief executive officer and financial director who, in turn, delegate some of these responsibilities to the executive committee and management, who are closer to the operations. A clear line of communication is in place to ensure these responsibilities are well managed, underpinning our value of accountability.

Each board committee comprises board members with the skills and expertise that suit its portfolio, allowing committee members to apply their minds and make well-considered recommendations to the board. Minutes of each committee meeting are included in the board packs distributed prior to board meetings to provide context to deliberations at committee meetings. To ensure board members are able to fully consider what they need to within these committees, and on the board, each director has unrestricted access to the advice and services of senior management, allowing them insight into the business, as well as full access to company and subsidiary information, records, documents and property. Our non-executive directors are encouraged to visit our operations and attend management meetings to get a sense of how they are run. However, they remain independent, allowing management to fulfil their duties fully. If they feel it is necessary, our board members can request independent, professional advice at the company's expense.

<table>
<tr><th colspan="2">Audit and risk committee</th></tr>
<tr><td>Members
John Wetton* (chairman)
Fikile De Buck*
Modise Motloba*
Simo Lushaba*
Karabo Nondumo*
* Independent non-executive</td><td>Description of committee's overall expertise and experience
• A total combination of the following skills and experiences on the part of the individual members of this committee enables them to execute their duties as members of the audit and risk committee:
• Accounting experience, experience in investment banking, treasury services and fund management
• Roles on various other boards, as well as industry bodies
• Governance experience
• Knowledge of business development in and around Africa
• Previous roles as chief financial officers, business managers and an external auditor. Therefore a good understanding of company finances, risk, processes and controls</td></tr>
<tr><td colspan="2">Primary functions</td></tr>
<tr><td colspan="2">• Monitors the operation of an adequate system of internal control and control processes
• Monitors the preparation of accurate financial reporting and statements in compliance with all applicable legal and corporate governance requirements and accounting standards
• Monitors risk management, ensures that significant risks identified are appropriately addressed and supports the board in the overall governance of risk</td></tr>
<tr><td colspan="2">Key activities and actions in FY16</td></tr>
<tr><td colspan="2">For the actions of the audit and risk committee in FY16 refer to the audit and risk committee chairman's report.</td></tr>
</table>

Investment committee	
Members Simo Lushaba* (chairman) Ken Dicks* Cathie Markus* Karabo Nondumo*^ Vishnu Pillay* John Wetton* André Wilkens * Independent non-executive ^ Appointed 25 May 2016	**Description of committee's overall expertise and experience** • The combination of the following skills equips the investment committee with knowledge of what reasonable returns on investments are and a thorough understanding of the investment process, as well as insight into what investors want: • Occupy various roles on other boards • Experience in entrepreneurship and business development • Extensive knowledge of the mining, legal and financial industries
Primary functions	
• Considers projects, acquisitions and disposals in line with Harmony's strategy and ensures that due diligence procedures are followed • Conducts other investment-related functions designated by the board	
Key activities and actions in FY16	
• Reviewed and recommended the budget and business plans for FY17 • Considered investments, proposals, projects and proposed acquisitions in line with the board's approved delegation of authority and the committee's terms of reference	

Nomination committee	
Members Fikile De Buck* (chairman) Joaquim Chissano* Patrice Motsepe Modise Motloba* Mavuso Msimang* * Independent non-executive	**Description of committee's overall expertise and experience** • The following insights allow the committee to find and nominate individuals who will add value to our Harmony board in the areas that we require: • Experience in the mining, financial, accounting and legal sectors • Extensive experience in management and leadership roles • Understanding of Harmony, and its needs, as well as of the requirements of being on a board
Primary functions	
• Ensures that procedures governing board appointments are formal and transparent • Makes recommendations to the board on all new board appointments • Reviews succession planning for directors and other members of the executive team and oversees the board's self-assessment process	
Key activities and actions in FY16	
• Reviewed succession planning for directors and other members of the executive team and oversaw the board's self-assessment process • Reviewed and recommended directors for re-election who retired by rotation in terms of the company's memorandum of incorporation • Reviewed and recommended the composition, structure and size of the board and board committees • Considered the positions of the chairman of the board, the deputy chairman of the board, the lead independent director and the deputy lead independent director and made recommendations to the board • Reviewed and recommended the independence of non-executive directors (especially independent non-executives serving on the board for longer than nine years) • Reviewed and recommended succession plans for the board, the chairman of the board, the chief executive officer, executive management, the company secretary and the head of internal audit • Followed a transparent and formal process in recommending the appointment of Peter Steenkamp as the company's new chief executive officer	

Remuneration committee	
Members Cathie Markus* (chairman) Fikile De Buck* Simo Lushaba* Vishnu Pillay* John Wetton* André Wilkens * Independent non-executive	**Description of committee's overall expertise and experience** • Experience in accounting, remuneration and financial management roles, as well as legal and mining experience, allowing members to ensure our remuneration is aligned with industry standards, best practice and legislation • Knowledge of the duties and responsibilities of board and executive positions, allowing realistic key performance indicators to be related to remuneration
Primary functions	
• Ensures directors and executive managers are fairly rewarded for their contribution to Harmony's performance • Assists the board in monitoring, reviewing and approving Harmony's compensation policies and practices, and in administrating its share incentive schemes • Operates as an independent overseer of the group remuneration policy and makes recommendations to the board for final approval	

Key activities and actions in FY16
• Reviewed and recommended the remuneration policy to the board for inclusion in the notice to the annual general meeting for consideration by the shareholders as a non-binding advisory resolution (see Remuneration Report) • Reviewed and recommended the remuneration report to be included in the integrated annual report (see Remuneration Report) • Reviewed and recommended the non-executive directors' fees to the board for consideration and approval by shareholders. For more information, refer to the Report to Shareholders 2016, which is available at www.har.co.za • Reviewed and recommended executive directors' and executive management's annual salary increases (see Remuneration Report) • Reviewed the annual salary increases of the company secretary and the head of internal audit • The details of these activities are contained in this committee's report, which can be found in the Remuneration Report.

Social and ethics committee	
Members Modise Motloba* (chairman) Joaquim Chissano* Fikile De Buck* Cathie Markus* Mavuso Msimang* John Wetton* * Independent non-executive	**Description of committee's overall expertise and experience** • Proven experience in the fields of sustainable and business development in Africa, community affairs, government relations, the drafting and implementing of charters, international relations and global leadership • The collective experience of committee members brings with it the skills and relationships necessary to ensure Harmony can contribute to meaningful change through its social development and transformation work. In addition, this experience adds weight to the committee's ability to enforce the code of conduct within Harmony
Primary functions	
• Oversees policy and strategies pertaining to occupational health and employee well-being, environmental management, corporate social responsibility, human resources, public safety and ethics management • Monitors implementation of policies and strategies by executives and their management teams for each discipline referred to above • Assesses compliance of the company against relevant regulations • Reviews material issues in each of the above disciplines to evaluate their relevance in the reporting period, and to identify additional material issues that warrant reporting, including sustainability related key performance indicators and levels of assurance	
Key activities and actions in FY16	
• Reviewed and recommended the social and ethics committee report to be included in the integrated annual report • Reviewed and considered the social, economic and environmental issues affecting the company's business • Reviewed and considered the effect that the company's operations had on the economic, social and environmental well-being of communities, as well as significant risks within the ambit of the committee's responsibilities • Approved material elements of sustainability reporting and the key performance indicators which were externally assured • Considered and monitored the company's employment relationships • Attended a site visit to the company's sustainable mining initiatives and community projects at Kalgold • See the Social and Ethics Committee: Chairman's report	

Technical committee	
Members André Wilkens (chairman) Ken Dicks* Vishnu Pillay* Karabo Nondumo* * Independent non-executive	**Description of committee's overall expertise and experience** • Decades of experience in the mining industry, particularly in gold, mining technology and mining engineering • Strong research skills • This experience allows members to grasp fully the technical and operational challenges facing Harmony and lend their knowledge to the tasks required of them
Primary functions	
• Provides a platform to discuss strategy, performance against targets, operational results, projects and safety • Informs the board of key developments, progress against objectives and the challenges facing operations • Reviews strategic plans before recommending such to the board for approval • Provides technical guidance and support to management	
Key activities and actions in FY16	
• Monitored exploration in South Africa and Papua New Guinea • Monitored all South African and Papua New Guinean operations • Reviewed and recommended to the board the company's annual budget and business plans • Monitored safety across all operations • Attended underground site visits to Kusasalethu, Joel and Tshepong/Phakisa.	

During FY16, the majority of the members of all board committees were independent non-executive directors. All board committees were chaired by an independent non-executive director, except for the technical committee chaired by André Wilkens (a non-independent, non-executive director). The board is confident that André's leadership as chairman of the technical committee is in the best interest of the company, based on his extensive knowledge of the specific areas of responsibilities of that committee.

Board and board committee meeting attendance

	Board	Audit and risk	Nomination	Remuneration	Technical	Investment	Social and ethics
Number of meetings	7	6	3	6	8*	4**	6**
Patrice Motsepe (chairman)	6	–	3	–	–	–	–
Modise Motloba (deputy chairman)	7	5	3	–	–	–	6
Joaquim Chissano	5	–	1	–	–	–	4
Fikile De Buck	6	6	2	5	–	–	4
Ken Dicks	7	–	–	–	8	4	–
Simo Lushaba	6	5	–	5	–	4	–
Cathie Markus	7	–	–	6		3	6
Mavuso Msimang	6	–	3	–	–	–	4
Karabo Nondumo***	7	5	–	–	6	–	–
Vishnu Pillay	5	–	–	4	8	4	–
John Wetton	7	6	–	6	–	4	6
André Wilkens	7	–	–	6	8	4	–
Peter Steenkamp	3^	–	–	–	–	–	–
Frank Abbott	7	–	–	–	–	–	–
Mashego Mashego	6	–	–	–	–	–	–
Graham Briggs	4#	–	–	–	–	–	–

– *Not applicable*
* *Includes two site visits*
** *Includes one site visit*

^ *Appointed to the board on 1 January 2016*
\# *Resigned from the board on 31 December 2015*
*** *Appointed to the Investment Committee in May 2016*

Company secretary

In terms of the JSE Listings Requirements, the board has, on the recommendation of the nomination committee, considered the performance, qualifications, level of experience and competence of the company secretary. The board is satisfied that Riana Bisschoff is sufficiently competent, qualified and experienced to act as Harmony's company secretary. The board is further satisfied that Riana is not a director of the board or any of the company's subsidiaries and that she maintained an arm's-length relationship with the board during FY16.

The following information was taken into consideration during the review:

Riana Bisschoff (LLB, LLM) is a qualified attorney, conveyancer and notary. She has been a company secretary for the past 12 years (nine years in a listed environment). Riana was appointed group company secretary in March 2012, and is fully supported by the board and management. She plays an active role in achieving good corporate governance, supporting the chairman and the board in:

- ensuring the effective functioning of the board
- providing guidance to the chairman, board and directors of Harmony's subsidiaries on their responsibilities and duties in the prevailing regulatory and statutory environment
- raising matters that may warrant the attention of the board

The company secretary assists in ensuring that the board's decisions and instructions are clearly communicated and is available as a central source of guidance and advice in Harmony on matters of ethics.

Board evaluation

The board conducts annual self-assessments of its own performance, as well as the performances of its board committees, individual directors and the chairman. From this process, a full report on the findings and recommendations is drawn up, and the board implements any changes necessary during the following financial year.

Legislative compliance

Relevant Global Reporting Initiative indicators: G4-SO7, G4-SO8

One of the duties of the board is to ensure that Harmony complies with all applicable laws, in both South Africa and Papua New Guinea, and that it adheres to non-binding rules, codes and standards. During the year, Harmony implemented a comprehensive compliance management system aimed to provide added assurance on regulatory compliance and good governance practices.

Harmony paid no significant fines in any of its areas of operation and had no actions brought against it for anti-competitive behaviour, or for anti-trust or monopoly practices during FY16. See the chairman's report for the social and ethics committee report as well as the chairman's report for the audit and risk committee report.

Given the importance of public policy and our strategic objective of maintaining our licence to operate, we have increased our engagement in recent years with the South African government on policy, often through the Chamber of Mines. One such example is our engagement with the Department of Mineral Resources, through the Chamber of Mines, on the new draft of the Broad-Based Socio-Economic Empowerment Charter for the South African Mining Industry (Mining Charter). We have also engaged, both directly and indirectly, with Eskom and the energy regulator on issues that could have an impact on our operations, such as security of the power supply, the cost of electricity and potential carbon taxes.

Rotation of directors

Aligning with King III and with Harmony's memorandum of incorporation, one-third of the board's non-executive directors must retire from office at each annual general meeting. These will be the non-executive directors who have been in office the longest since their last election. In addition, those directors appointed following the last annual general meeting held are also expected to stand down for election by shareholders following their respective appointments.

In line with this, the directors who will retire at this year's annual general meeting are:

- Cathie Markus
- Karabo Nondumo
- Vishnu Pillay
- André Wilkens

Their summary resumés are available in the Board of Directors section of this report. Their detailed resumés are available in the Report to Shareholders, at www.har.co.za/16/download/HAR-RS16.pdf and are also accessible on www.harmony.co.za/about-us/board.

Code of conduct

Relevant Global Reporting Initiative indicators: G4-S05

Developed to respond to the challenge of ethical conduct in the business environment, our code of conduct commits Harmony, our employees and our contractors to the highest moral standards, free from conflicts of interest. Over the past few years we have done extensive work in enshrining our five values – safety, accountability, achievement, connectedness and honesty – into everyday behaviour at Harmony, through constructive employee engagement. These values underpin our code of conduct and align it with our strategy.

During FY16, our code of ethics was replaced by a code of conduct and a behavioural code in consultation with the Ethics Institute of South Africa. This was done as part of our continued efforts to adhere to good corporate governance and ethical standards. Making our codes easier to read and understand was part of this process.

The board will review these codes every second year, while their application within Harmony is continually monitored by management. Our ethics programme is also subject to independent assurance as part of the internal audit coverage plan.

Our management ethics committee monitors our ethical culture and integrity. It also assesses declarations of interest in terms of the code of conduct and provides feedback to the executive committee, which then reports to the board's social and ethics committee. As a result, ethics are discussed and examined at every level of management within the company.

The code of conduct encourages employees and other stakeholders to report any suspected irregularities. This can be done anonymously through a 24-hour crime line (which is managed by external auditing specialists), as well as other channels. All incidents reported are investigated and monitored by the white-collar crime committee, which comprises managers representing various disciplines in the company and reports to the management ethics committee.

The identity of any employee or stakeholder who reports non-compliance with the code of conduct is protected. Our anonymous ethics hotline number, which is widely advertised throughout the organisation, is +27 (0) 800 21 23 39.

Restrictions on share dealings

During price-sensitive periods, our employees and directors are prohibited from dealing in Harmony shares. Written notice of these restricted periods is communicated to employees and directors by the company secretary. In terms of regulatory and governance standards, directors and employees are required to disclose any dealings in Harmony shares in accordance with the JSE Listings Requirements. The clearance procedure for directors and the company secretary to deal in Harmony shares is regulated by the company's policy on trading in shares and insider trading.

Information technology governance

The board recognises that information technology is integral to doing business today, and fundamental in supporting the sustainability and growth of our company. Accordingly, the focus of our information technology division is to ensure accurate, reliable and timely information that supports effective reporting and appropriate management of our business to enable Harmony to achieve its sustainability objectives.

The audit and risk committee monitors the return on investment from significant information technology projects. Information technology management ensures that the key elements of appropriate project management principles are applied to all information technology projects. A management information technology steering committee has oversight of various information technology aspects, including governance, compliance and business continuity.

Formal processes are in place to protect and manage information, including sensitive information processed by the company, with a greater emphasis on cyber security. Various initiatives are underway to raise awareness of the types of threats and what to do if such an event occurs.

Political donations

Relevant Global Reporting Initiative indicators: G4-SO6

Harmony supports South Africa's democratic processes and contributes to its political parties. A policy relating to political donations has been adopted by the company. In the year under review, R2 million (US$0.1 million) was donated to political parties in accordance with this policy.

Sarbanes-Oxley

In line with New York Stock Exchange listing requirements, we comply with the Sarbanes-Oxley Act. Details of this compliance and relevant processes can be found in our Form 20-F for FY16, which is available at www.harmony.co.za/investors/reporting/20f from 26 October 2016.

Access to information

Harmony complies with the Promotion of Access to Information Act 2000, which protects the constitutional right to information that is required to exercise or protect a right. The purpose of this legislation is to foster a culture of transparency and accountability in both public and private bodies, and to promote a society in which all South Africans are enabled to enjoy their rights. For more on this see our website: www.harmony.co.za/sustainability/governance#policies. The company received no requests for access to information in term of this legislation during FY16.

HUMAN RIGHTS

Relevant Global Reporting Initiative indicators: G4-HR1, G4-LA14, G4-HR3, G4-HR9, G4-HR10, G4-HR12, G4-SO3, G4-S03

Harmony recognises that human rights should be integrated into all that we do and, through the entrenchment of our values, we endeavour to do this every day.

In line with the Companies Act, the social and ethics committee's responsibilities include monitoring of the company's standing in terms of the goals and purposes of the ten principles set out in the United Nations Global Compact. The United Nations Global Compact asks companies to embrace, support and enact, within their sphere of influence, a set of core principles in the areas of human rights, labour standards, the environment and anti-corruption. The social and ethics committee monitors our performance regarding these principles, based on the various reports submitted to them in terms of the committee's annual work plan.

We acknowledge that human rights cannot be limited to how we conduct our business, but must also be considered when we consider our business partnerships with other companies involved in our supply chain. We screen prospective suppliers on their level of legal compliance and compare their business practices with those prescribed in our code of conduct. This ensures that they behave in a way that Harmony believes is appropriate and that is aligned with our values.

During the year under review, we did not identify any human rights infringements on the part of companies involved in our supply chain, nor did we terminate any relationships on this basis. Furthermore, no human rights grievances were recorded against Harmony.

REMUNERATION REPORT

REMUNERATION COMMITTEE CHAIRMAN'S LETTER

Over the past year we have taken into consideration the constructive feedback from our shareholders by introducing a minimum shareholding requirement for the executive management and directors and with regard to both the short- and long-term incentives, we have increased the acceptable level of performance and introduced personal performance criteria for executive short-term incentives.

I therefore have pleasure in submitting the annual remuneration report for FY16 on behalf of the remuneration committee and the board. Recommended changes to our short- and long-term incentive schemes are highlighted throughout the relevant sections in the report.

Our report is divided into two sections:

- Part one: remuneration, governance and policy
- Part two: remuneration outcomes during the year under review (FY16).

As before, this remuneration report and policy continues to focus on the remuneration of executive directors, executive management and prescribed officers as well as on the fees paid to non-executive directors. We rely on carefully designed variable pay structures which require certain levels of performance against activities that are of primary importance to the sustainability and success of our business. We continually reassess these measures to ensure that they are aligned with our group strategy. We also give an overview of our employee share-option scheme, the Tlhakanelo Employee Share Trust, which aims to give our non-managerial employees an opportunity to benefit as Harmony shareholders.

For more on the committee and its activities during the year under review see the governance report on page 128 of this report

Cathie Markus
Chairman, remuneration committee
26 October 2016

PART ONE: REMUNERATION GOVERANCE AND POLICY

REMUNERATION COMMITTEE

The remuneration committee is the custodian of Harmony's remuneration policy and its implementation. No member of the committee has a personal interest in the outcome of decisions made, and five of its six members are independent non-executive directors.

For more information on the composition, primary functions, activities and actions of this committee, refer to the Corporate Governance section on page 128. The terms of reference of this committee are available at www.harmony.co.za/sustainability/governance#policies.

The main focus areas for the remuneration committee during the year were as follows:

- Reviewed the short-term incentive scheme, the applicable performance measures and the minimum threshold for bonus qualification
- The inclusion of a personal performance measurement on short-term incentives for executive management
- Revision of the long-term incentive scheme, including the use of share appreciation rights, and the performance measures applied to performance shares
- Determination of a minimum shareholding requirement for executive management and directors
- Benchmarking of executive and non-executive remuneration
- Engagement with our shareholders
- Approval and recommendation of the remuneration report

HARMONY'S REMUNERATION POLICY – ALIGNED WITH STRATEGY

Harmony's reward strategy underpins our business strategy of producing profitable ounces, safely and increasing our margins.

In order to achieve this, we rely on experienced, skilled teams who live our values and maintain stakeholder relationships, in growing profits, and in maintaining a sustainable company.

Our remuneration policy has been designed with our business strategy in mind – to attract and retain these experienced, skilled teams, and to motivate them to deliver and achieve our key business goals. To ensure that this happens, we need to be certain that all elements of our remuneration and wider reward offerings are aligned and market competitive.

In determining remuneration, the remuneration committee takes into account shareholders', interests as well as the financial health and future of the company.

BOARD REMUNERATION (NON-EXECUTIVE DIRECTORS)

Harmony's philosophy regarding the remuneration of non-executive directors is to ensure that they are fairly rewarded for their contribution to the company's overall performance.

Non-executive directors' fees are reviewed annually to ensure that they remain competitive. In line with the recommendations of King III, our non-executive directors are paid a retainer for board meetings and an attendance fee for every board meeting attended. Non-executive directors also receive a retainer for serving on a committee. In addition, an ad hoc fee is paid for special meetings or attendance to company business, per day.

Non-executive directors do not receive share options or other incentive awards correlated with the share price or group performance as these may impair their ability to provide impartial oversight and advice.

The proposed fees for FY17 are set out in the notice of annual general meeting on page 29 in the Report to Shareholders 2016.

REMUNERATION MIX AT HARMONY

Harmony chooses to adopt an integrated approach to rewarding its employees.

KEY ELEMENTS OF HARMONY'S REMUNERATION STRUCTURE	
Reward elements	Remuneration strategy
Guaranteed pay	In reviewing and approving levels of guaranteed pay, the committee ensures that the guaranteed pay portion of remuneration is aligned with similar roles in the market sector in which we operate and the contribution made by employees. To compete effectively for skills in a challenging employment market, we identify the target market against which to benchmark guaranteed pay. This target market includes those organisations or companies that employ similar skills sets to those which we require. Comparisons are made predominantly with the mining and resources sectors to ensure that Harmony remains competitive. Harmony aims for guaranteed pay levels relative to the median of the target market. Guaranteed pay is inclusive of contributions by the company to a retirement fund and a medical aid scheme.

Short-term incentive	The short-term incentive scheme provides for bonus payments. Bonus payments are: • based on team performance against annual targets that are reviewed annually, modified by a personal performance rating for executive management • paid twice a year for all management employees in corporate, central services, medical services and central operations (including executive management and prescribed officers) • paid quarterly for designated shaft management team members and regional operations management teams During FY16, the board approved the following changes to the short-term incentive scheme: • the minimum acceptable level of performance (i.e. qualification threshold) was increased from 90% to 95% • the R/kg performance driver was changed to total cost (working cost plus capital excluding royalties) • the short-term incentive for executives to be modified by a personal performance rating The targets on which bonus payments are based are derived from the company's business plan which is developed in terms of the company's strategic objectives for the year. For executive management, the measures and weightings are as follows: **Performance drivers** — **Weighting** Gold produced — 40% Total cost (working costs +capex excl. royalties) — 30% Underground grade — 30% **Payment parameters** To achieve a minimum qualification for a bonus, Harmony must achieve at least 95% of the business plan. On-target performance will result in a total bonus of 60% of guaranteed pay. Above-target performance is capped at 100% of guaranteed pay as illustrated below: **% of business plan achieved** — **% of 6-month guaranteed pay** — **Parameter** <95 — 0 — 95 — 40 — Threshold 100 — 60 — Target 105 — 100 — Maximum >105 — 100 — **Safety as a modifier** Safety performance is applied as an adjustment in the calculation of our short-term incentive bonuses. The company's lost-time injury frequency rate for the total South African business plan is used to measure Harmony's safety performance. If the planned safety target is achieved, 10% will be added to the overall percentage bonus paid. If the company does not achieve its safety target, up to 10% will be deducted from the overall percentage bonus paid as per the gradation scale illustrated below: **Achievement against business plan** — **% added or deducted from overall bonus percentage*** 100 — 10% 95 — 5% 90 — 0% 85 — -5% 80 — -10%

	*Linear interpolation between these points **Personal performance modifier:** The personal performance percentage will be calculated according to an executive manager's personal performance measured against objectives set out in that executive's performance management contract as follows: Guaranteed pay x group performance against plan (0% – 100%) x personal performance percentage (0% – 150%)
Long-term (share-based) incentive	The Harmony share plan (the plan) consists of share appreciation rights (SARs), performance shares and restricted shares. Employees eligible for participation in the plan include executive directors, executive management and management. Non-executive directors may not participate in the plan. There is no repricing or surrender or re-grant of any offers. Share awards are not granted in a closed period and no backdating of awards is allowed. Rewards are settled in shares, although participants may receive, via our share scheme administrators, cash from the sale of these shares, less tax payable. The main elements of the share plan and performance conditions are summarised below. **Share appreciation rights (SARs)** Eligible employees received annual allocations based on a percentage of their cost to company, which vest in equal thirds on the third, fourth and fifth anniversaries of such allocations and lapse in the sixth year as illustrated below. The value or reward that accrues is based on the positive appreciation of the share price over time (compared to the issue price) and continued employment. The company acknowledges shareholders' sentiment with regard to the issuing of share appreciation rights. Such views will be considered should the company issue new share appreciation rights going forward. Share appreciation rights were last allocated in November 2014 (FY15). **Performance shares** Eligible employees receive annual conditional awards of a maximum number of performance shares based on a percentage of cost to company and remuneration category. The conditional award vests after three years, if and to the extent that performance conditions have been satisfied. The conditional awards that do not vest at the end of the three-year period will be forfeited. The company reviewed and changed the performance criteria for performance shares. Awards made since November 2015 will be measured on the total shareholder return of the company over a three-year period and will be capped at the maximum vesting percentage of 100%. The total shareholder return vesting criteria will comprise of two components: • 50% is based on absolute performance which takes into account the value of the company's share price growth and the value of dividends paid over the measurement period • 50% is based on the relative performance of the company compared to that of the gold index over the measurement period

Absolute performance:

Performance	Achievement	Vesting*
Full (stretch)	100%	100%
Target	80%	80%
Threshold	45%	0%

*Linear interpolation will apply between levels

Relative performance:

Performance	Achievement	Vesting*
Full (stretch)	40%	150%
Target	0%	40%
Threshold	-5%	0%

*Linear interpolation will apply between levels

Details of the awards made during FY16 can be found in Part Two of this Remuneration Report.

Restricted shares

The share plan allows for restricted shares and matching performance shares to be granted to eligible employees at the discretion of the board based on past performance. The board determines the quantum and balance between restricted shares and matching performance shares.

Restricted shares vest three-years from the grant date. If the grant is not exercised, partially or fully at the time, these shares remain restricted for a further three years and are supplemented by a matching grant of restricted shares. The restricted shares and the matching restricted shares are then settled after the end of a further three-year period.

We acknowledge the sentiments of shareholders with regard to restricted shares and our last grant of new restricted shares was made in 2012.

Plan limit

The approved aggregate number of shares that may be acquired by participants in the long-term incentive plan, together with any other share plan or scheme are 60 011 669 shares as approved by the members of the company at an annual general meeting held on 1 December 2010. To date, Harmony has issued 7 792 861 of these approved shares.

The aggregate number of shares that may be acquired by any one participant in terms of the long-term incentive plan together with any other share plan or scheme approved by the members shall not exceed 2 100 000 shares. To date, none of the participants has acquired an aggregate of more than 2 100 000 shares.

Recommended changes to the Harmony share plan (the plan)

A proposal will be made at the forthcoming annual general meeting to amend the plan to:

- introduce a minimum shareholding requirement for executive management;
- determine the vesting of performance shares on actual achievement against the applicable performance criteria when a participant is a good leaver.

For more information refer to the notice of the annual general meeting in the Report to Shareholders 2016 at www.har.co.za.

Tlhakanelo Employee Share Trust	Administered in terms of the Tlhakanelo trust, this share-based incentive scheme ensures that current and future qualifying employees participate in Harmony's growth. Qualifying employees are those who are permanently employed by the company and who do not participate in any of the company's other share incentive schemes. Under the Tlhakanelo employee share scheme, each award is split into the ratio of two

	share appreciation rights for each ordinary share and these vest annually in equal tranches on each anniversary of the allocation date. As per the provisions of the trust deed, the last tranche of shares allocated in terms of the scheme will vest during March 2017. Share appreciation rights are subject to a guaranteed minimum payout of R18 per share appreciation right and a maximum payout of R32 per share appreciation right on each vesting date (over the five-year period). Prior to vesting, participants may elect to receive their shares or have these sold on their behalf. **Details of the awards made during FY16 can be found in Part Two of this Remuneration Report.**

CONTRACTS, SEVERANCE AND TERMINATION

Executive directors and executive managers have employment contracts with Harmony which include notice periods of up to 90 days. There are no balloon payments on termination, automatic entitlement to bonuses or automatic entitlement to share-based payments other than in terms of the company's approved share incentive plans.

NON-BINDING ADVISORY VOTE

Shareholders are requested to cast a non-binding advisory vote required by King III on Part One of this remuneration report as it appears above. For more information refer to the notice of the annual general meeting in the Report to Shareholders 2016 at www.har.co.za/16/download/HAR-RS16.pdf

STAKEHOLDER FEEDBACK

We maintain open communication channels with our stakeholders, listen to feedback and take action where this is deemed to be in the best interests of the company. Based on comments received from shareholders following our FY15 remuneration report, we have enhanced our reporting and changed the parameters of our short-term and long-term incentive schemes.

PART TWO: REMUNERATION PAID DURING THE YEAR BASED ON THE POLICY APPLICABLE IN 2016

INCREASES TO GUARANTEED PACKAGE DURING THE YEAR UNDER REVIEW

An assessment of executive remuneration, and short- and long-term incentives was undertaken during FY16.

Taking into consideration the prevailing market conditions, affordability and shareholders' expectations, an average increase of 5% to guaranteed remuneration packages of executives and management was made during FY16.

SHORT-TERM INCENTIVE PAYMENTS DURING THE YEAR UNDER REVIEW

During the year under review, achievement levels against the targets for the executive short-term incentive scheme were as follows:

First period FY16 (July to December 2015)			
Company performance measures	Weighting	% of plan achieved	Weighted %
Total kilograms	40	98	18.4
Total cost (R/kg)	30	97	13.2
Grade	30	103	19.5
Weighted average	–		51.1
Lost-time injury frequency rate adjustment			10
Percentage of six-months' guaranteed pay			61.1

Second period FY16 (January to June 2016)			
Company performance measures	Weighting	% of plan achieved	Weighted %
Total kilograms	40	87%	0
Total cost (R/kg)	30	78%	0
Grade	30	95%	12
Weighted average	–		12
Lost-time injury frequency rate adjustment			4
Percentage of six-months' guaranteed pay			16

LONG-TERM INCENTIVES AWARDED DURING THE YEAR UNDER REVIEW

During FY16, the company took its shareholders' sentiment with regard to the issuing of share appreciation rights into consideration. As a result, no share appreciation rights were issued to employees in FY16. Instead, such rights were replaced with a commensurate number of performance shares.

Harmony share plan rules applicable to the FY16 awards:

Share appreciation rights: The value or reward that accrues on share appreciation rights is based on the positive appreciation of the share price over time compared to the issue price.

Performance shares: The performance measure applicable to the performance awards is based on Harmony's total shareholder return over a three-year period. The vesting criteria will comprise of two components, namely, absolute and relative performance, as set out on in this report, with vesting capped at 100%.

Matching shares: No further grants of restricted shares have been made since 2012. The 2012 restricted shares not exercised in 2015 were supplemented with matching restricted shares.

The number of grants awarded for each executive director, prescribed officer and executive manager is as set out in the table on page 143 of this report.

Vesting of long-term incentives during the year under review

During the year, the following awards in terms of the long-term incentive plan vested in November 2015:

- **Share appreciation rights allocated in November 2012**
  The performance condition determined that the headline earnings per share growth from the allocation date should exceed the consumer price index. Headline earnings did not exceed the consumer price index. The performance condition was therefore not met. In terms of the long-term incentive plan, if the performance criteria have not been met, no rights will vest but will be postponed to the following anniversary until the performance criteria are met or the maximum period (sixth anniversary) is reached.
- **Performance shares awarded in November 2012**
  The vesting percentage of performance shares was based on the achievement of two conditions, namely gold production against plan and relative share price performance against South African gold mining companies.

  This resulted in a total vesting of 32.5% of performance shares granted in November 2012 calculated as follows:
  - Gold production had a maximum vesting of 50% and a minimum vesting of 0%. The company achieved 92%, 87% and 88% of plan over the three consecutive years which resulted in an average vesting of 20%.
  - The company underperformed against its peers on the basis of its relative share price performance which resulted in vesting of 12.5%.
- **Restricted shares granted in November 2012**
  In terms of the plan, restricted shares not exercised will be supplemented by a matching award of restricted shares, also restricted for three years.

  Restricted shares granted in November 2012 were not exercised and remained restricted for a further three years. Based on the discretion of the board, the restricted shares were supplemented by a matching award of restricted shares at a ratio of three-for-one for executives.

TOTAL REMUNERATION OUTCOMES

Payments made through the Tlhakanelo Employee Share Trust

Incentives	FY16:	Total since incorporation of the trust:
Value of ordinary shares sold and proceeds paid to participants (before tax)	R30 million	R132 million
Value of bonus payments paid to participants by Harmony based on R18 per share appreciation right (before tax). No sale of shares	R18 million	R105 million
Total payments received by participants (value of shares plus share appreciation rights bonus) (before tax)	R49 million	R237 million

NON-EXECUTIVE DIRECTORS' FEES

During August 2016, the remuneration committee considered an industry benchmark on non-executive directors' fees. On the recommendation of the remuneration committee, the board proposed an increase in fees for all non-executive directors, to be considered for approval by the shareholders at the forthcoming annual general meeting. For more information on the notice of the annual general meeting refer to the Report to Shareholders 2016 at www.har.co.za/16/download/HAR-RS16.pdf.

DIRECTORS' EMOLUMENTS

Directors' remuneration (R000)

Name	Directors' fees FY16	Salaries and benefits FY16	Retirement savings and contributions during the year FY16	[1]Bonuses paid FY16	Total FY16	Total FY15
Non-executive						
Patrice Motsepe	1 105	–	–	–	**1 105**	1 077
Joachim Chissano	463	–	–	–	**463**	415
Fikile De Buck	970	–	–	–	**970**	836
Ken Dicks	606	–	–	–	**606**	482
Dr Simo Lushaba	718	–	–	–	**718**	615
Cathie Markus	694	–	–	–	**694**	705
Modise Motloba	971	–	–	–	**971**	841
Mavuso Msimang	545	–	–	–	**545**	443
Karabo Nondumo	544	–	–	–	**544**	561
Vishnu Pillay	593	–	–	–	**593**	472
John Wetton	956	–	–	–	**956**	789
Andre Wilkens	784	–	–	–	**784**	637
Executive						
Frank Abbott	–	5 247	130	1 687	**7 064**	5 964
Graham Briggs[2]	–	4 260	–	2 655	**6 915**	10 012
Mashego Mashego	–	3 664	404	1 217	**5 285**	4 797
Peter Steenkamp[3]	–	3 526	496	–	**4 022**	–
Prescribed officers						
Beyers Nel[4]	–	1 282	194	207	**1 683**	–
Alwyn Pretorius[5]	–	360	42	–	**402**	5 823
Phillip Tobias[6]	–	1 346	156	88	**1 590**	–
Johannes van Heerden[7]	–	7 187	315	1 124	**8 626**	6 119
Executive management	–	15 049	1 369	4 967	**21 385**	20 943
Total	**8 949**	**41 921**	**3 106**	**11 945**	**65 921**	61 531

[1] Reflects amounts paid and not earned during the year
[2] Stepped down as chief executive officer on 31 December 2015
[3] Appointed as chief executive officer on 1 January 2016
[4] Appointed as prescribed officer on 1 March 2016
[5] Stepped down as prescribed officer on 31 July 2015
[6] Appointed as prescribed officer on 1 March 2016
[7] Salary is paid in AUS$ and is influenced by the movement in the exchange rate

EXECUTIVE DIRECTORS AND MANAGEMENT SHARE INCENTIVES

As at 30 June 2016

	Executive directors								Prescribed officers						Other					
	Peter Steenkamp		Frank Abbott		Mashego Mashego		Graham Briggs[1]		Johannes van Heerden		Beyers Nel[2]		Phillip Tobias[3]		Executive management[4]		Other management		Total	
Movements on share incentives	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**
Performance shares																				
Opening balance at 1 July 2015	–	n/a	437 195	n/a	314 790	n/a	1 187 604	n/a	314 790	n/a	142 395	n/a	91 662	n/a	1 597 721	n/a	10 236 351	n/a	14 322 508	n/a
Awards granted	512 000	n/a	736 809	n/a	455 758	n/a	550 000	n/a	455 758	n/a	236 220	n/a	236 220	n/a	1 875 118	n/a	20 594 748	n/a	25 652 631	n/a
Awards exercised	–	n/a	18 547	n/a	13 153	n/a	234 006	n/a	13 153	n/a	5 621	n/a	–	n/a	65 013	n/a	453 808	n/a	803 301	n/a
– Average sales price	–	n/a	–	8.78	–	8.78	–	37.29	–	8.78	–	8.78	–	n/a	–	8.78	–	13.02	–	19.55
– Gain realised on awards exercised and settled		–		162 843		115 483		8 725 326		115 483		49 352		–		570 814		5 962 993		15 702 295
Awards forfeited and lapsed	–	n/a	38 520	n/a	27 318	n/a	1 503 598	n/a	27 318	n/a	11 676	n/a	–	n/a	451 105	n/a	2 134 265	n/a	4 193 800	n/a
Closing balance at 30 June 2016	**512 000**	**n/a**	**1 116 937**	**n/a**	**730 077**	**n/a**	**–**	**n/a**	**730 077**	**n/a**	**361 318**	**n/a**	**327 882**	**n/a**	**2 956 721**	**n/a**	**28 243 026**	**n/a**	**34 978 038**	**n/a**
Restricted shares																				
Opening balance at 1 July 2015	–	n/a	37 136	n/a	27 694	n/a	190 456	n/a	72 218	n/a	12 021	n/a	–	n/a	166 626	n/a	166 951	n/a	673 102	n/a
Awards granted	–	n/a	63 408	n/a	35 082	n/a	63 486	n/a	35 082	n/a	24 063	n/a	–	n/a	138 318	n/a	149 481	n/a	508 920	n/a
Awards exercised	–	n/a	–	n/a	–	n/a	253 942	n/a	–	n/a	–	n/a	–	n/a	–	n/a	18 540	n/a	272 482	n/a
– Average sales price	–	n/a	–	n/a	–	n/a	–	44.42	–	n/a	–	n/a	–	n/a	–	n/a	–	17.46	–	42.59
– Gain realised on awards exercised and settled		–		–		–		11 280 104		–		–		–		–		323 777		11 603 881
Awards forfeited and lapsed	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	27 694	n/a	25 872	n/a	53 566	n/a
Closing balance at 30 June 2016	–	n/a	100 544	n/a	62 776	n/a	–	n/a	107 300	n/a	36 084	n/a	–	n/a	277 250	n/a	272 020	n/a	855 974	n/a

Movements on share incentives	Executive directors								Prescribed officers						Other				Total	
	Peter Steenkamp		Frank Abbott		Mashego Mashego		Graham Briggs[1]		Johannes van Heerden		Beyers Nel[2]		Phillip Tobias[3]		Executive management[4]		Other management		Total	
	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)
Share appreciation rights																				
Opening balance at 1 July 2015	–	n/a	139 362	33.97	112 907	39.27	264 390	38.82	114 128	39.68	85 391	38.85	46 850	18.41	571 400	38.76	15 085 539	39.12	16 419 967	38.86
Rights granted and accepted	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a
Rights accepted	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	669 824	18.42	669 824	18.42
Rights exercised	–	n/a	–	n/a	–	n/a	199 431	n/a	–	n/a	–	n/a	–	n/a	–	n/a	233 219	n/a	432 650	n/a
– Average sales price	–	n/a	–	n/a	–	n/a	–	44.42	–	n/a	–	n/a	–	n/a	–	n/a	–	46.40	–	45.49
– Gain realised on rights exercised and settled		–		–		–		3 830 369		–		–		–		–		5 212 932		9 043 301
Rights forfeited and lapsed	–	n/a	–	n/a	5 327	77.28	64 959	80.58	6 548	77.28	4 482	77.28	–	n/a	150 922	43.85	2 268 121	60.49	2 500 359	59.21
Closing balance at 30 June 2016	**–**	**n/a**	**139 362**	**33.97**	**107 580**	**37.39**	**–**	**n/a**	**107 580**	**37.39**	**80 909**	**36.72**	**46 850**	**18.41**	**420 478**	**36.94**	**13 254 023**	**34.68**	**14 156 782**	**34.74**
Gain realised on awards exercised (SA rand)		–		162 843		115 483		23 835 799		115 483		49 352		–		570 814		11 499 702		36 349 476

EXECUTIVE DIRECTORS AND MANAGEMENT SHARE INCENTIVES *(continued)*

As at 30 June 2016

	Executive directors								Prescribed officers						Other				Total	
	Peter Steenkamp		Frank Abbott		Mashego Mashego		Graham Briggs[1]		Johannes van Heerden		Beyers Nel[2]		Phillip Tobias[3]		Executive management[4]		Other management		Total	
Outstanding awards (listed by allocation date)	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**	**Number of awards**	**Average price (SA rand)**
Performance shares	**512 000**		**1 116 937**		**730 077**		**–**		**730 077**		**361 318**		**327 882**		**2 956 721**		**28 243 026**		**34 978 038**	
15 November 2013	–	n/a	172 666	n/a	124 604	n/a	–	n/a	124 604	n/a	51 768	n/a	–	n/a	491 299	n/a	3 652 588	n/a	4 617 529	n/a
17 November 2014	–	n/a	207 462	n/a	149 715	n/a	–	n/a	149 715	n/a	73 330	n/a	91 662	n/a	590 304	n/a	5 129 200	n/a	6 391 388	n/a
16 November 2015	–	n/a	736 809	n/a	455 758	n/a	–	n/a	455 758	n/a	236 220	n/a	236 220	n/a	1 875 118	n/a	19 461 238	n/a	23 457 121	n/a
17 February 2016	512 000	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	–	n/a	512 000	n/a
Restricted shares	**–**		**100 544**		**62 776**		**–**		**107 300**		**36 084**		**–**		**277 250**		**272 020**		**855 974**	
15 November 2010	–	n/a	–	n/a	–	n/a	–	n/a	22 262	n/a	–	n/a	–	n/a	26 413	n/a	30 606	n/a	79 281	n/a
15 November 2011	–	n/a	8 000	n/a	8 000	n/a	–	n/a	8 000	n/a	4 000	n/a	–	n/a	20 000	n/a	16 000	n/a	64 000	n/a
16 November 2012	–	n/a	21 136	n/a	11 694	n/a	–	n/a	11 694	n/a	8 021	n/a	–	n/a	46 106	n/a	44 702	n/a	143 353	n/a
15 November 2013 (2010 award - matching shares)	–	n/a	–	n/a	–	n/a	–	n/a	22 262	n/a	–	n/a	–	n/a	26 413	n/a	30 606	n/a	79 281	n/a
17 November 2014 (2011 award - matching shares)	–	n/a	8 000	n/a	8 000	n/a	–	n/a	8 000	n/a	–	n/a	–	n/a	20 000	n/a	16 000	n/a	60 000	n/a
16 November 2015 (2012 award - matching shares)	–	n/a	63 408	n/a	35 082	n/a	–	n/a	35 082	n/a	24 063	n/a	–	n/a	138 318	n/a	134 106	n/a	430 059	n/a
Share appreciation rights	**–**		**139 362**		**107 580**		**–**		**107 580**		**80 909**		**46 850**		**420 478**		**13 254 023**		**14 156 782**	
15 November 2010	–	n/a	–	84.81	6 400	84.81	–	n/a	6 400	84.81	4 329	84.81	–	n/a	22 405	84.81	536 843	84.81	576 377	84.81
15 November 2011	–	n/a	6 585	104.79	5 361	104.79	–	n/a	5 361	104.79	4 620	104.79	–	n/a	20 275	104.79	549 238	104.79	591 440	104.79
16 November 2012	–	n/a	16 204	68.84	11 694	68.84	–	n/a	11 694	68.84	8 021	68.84	–	n/a	46 106	68.84	1 275 807	68.84	1 369 526	68.84
15 November 2013	–	n/a	52 951	33.18	38 212	33.18	–	n/a	38 212	33.18	26 459	33.18	–	n/a	150 665	33.18	4 619 989	33.18	4 926 488	33.18
17 November 2014	–	n/a	63 622	18.41	45 913	18.41	–	n/a	45 913	18.41	37 480	18.41	46 850	18.41	181 027	18.41	6 272 146	18.41	6 692 951	18.41

	Executive directors								Prescribed officers						Other					
	Peter Steenkamp		Frank Abbott		Mashego Mashego		Graham Briggs[1]		Johannes van Heerden		Beyers Nel[2]		Phillip Tobias[3]		Executive management[4]		Other management		Total	
Outstanding awards (listed by allocation date)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)	Number of awards	Average price (SA rand)
Closing balance as at 30 June 2016	**512 000**		**1 356 843**		**900 433**		**–**		**944 957**		**478 311**		**374 732**		**3 654 449**		**41 769 069**		**49 990 794**	

[1] Graham Briggs retired as chief executive officer and director with effect from 31 December 2015. The gain realised on awards and rights settled, in terms of the "no fault" provisions of the share plan amounted to R23 422 872.

[2] Beyers Nel appointed as chief operating officer of the South African operations with effect from 1 March 2016. All awards were granted prior to this appointment.

[3] Phillip Tobias appointed as chief operating officer of safety, mining projects, new development and corporate strategy with effect from 1 March 2016. All awards were granted prior to this appointment.

[4] Alywyn Pretorius, previously the chief operating officer of the South African Operations (prescribed officer) resigned from the group with effect from 30 November 2015. All awards and the movements thereon are included as part of executive management.

AUDIT AND RISK COMMITTEE: CHAIRMAN'S REPORT

In accordance with the Companies Act 71 of 2008 (the Act), I have pleasure in submitting this report for the financial year ended 30 June 2016. This committee complies with the requirements of the Act pertaining to the composition and functions of an audit committee. In addition, as explained in the committee's terms of reference, Harmony's audit committee is also tasked with overseeing risk management in the company and is therefore known as the audit and risk committee (the committee).

COMPOSITION OF THE COMMITTEE

In terms of the Act, the following members, who were serving on the committee as at 30 June 2016, will be recommended for re-appointment as audit and risk committee members for FY17 to shareholders at Harmony's annual general meeting:

Name	Status	Date appointed
John Wetton (chairman)	Independent non-executive director	1 July 2011, appointed chairman 30 November 2011
Fikile De Buck	Lead independent non-executive director	30 March 2006
Dr Simo Lushaba	Independent non-executive director	24 January 2003
Modise Motloba	Independent non-executive director	30 July 2004
Karabo Nondumo	Independent non-executive director	3 May 2013

The individuals proposed satisfy the requirements set out in section 94 of the Act for members of an audit committee, and their appointment will ensure that the committee continues to have adequate and relevant knowledge as well as the experience required for the committee to perform its functions proficiently. For details of the qualifications, expertise and experience of the members of the audit and risk committee, refer to Board of Directors. Their detailed curriculum vitae are available at www.harmony.co.za/about-us/board.

PURPOSE, ROLE AND ACTIVITIES

The purpose and role of the committee is in accordance with the requirements of the Act, the JSE Listings Requirements, King III and additional requirements imposed on the committee by the board. Further details can be found in the committee's terms of reference available on Harmony's website at www.harmony.co.za/sustainability/governance#policies.

The committee undertakes its duties with accountability to both the board and stakeholders of Harmony. In FY16, the committee:

- Reviewed the company's financial results
- Evaluated and considered Harmony's risks, as well as measures taken to mitigate those risks. In addition, the committee also considered and refined the company's risk appetite and tolerance levels
- Monitored the internal control environment in Harmony and found it to be effective
- Discussed the appropriateness of accounting principles, critical accounting policies, management judgements, estimates and impairments, all of which were found to be appropriate

- Considered the appointment of the external auditor, PricewaterhouseCoopers Inc (PwC), as the registered independent auditor for the ensuing year. A new PwC audit partner (Hendrik Odendaal) was appointed from FY16 following the compulsory rotation of Faan Lombard, who had served as Harmony's audit partner for the previous five years
- Satisfied itself, and confirmed through enquiry, that the external audit firm, PwC, was independent from the company
- Evaluated the independence and effectiveness of the internal audit function
- Evaluated and coordinated the internal audit, external audit and sustainability assurance processes
- Received and considered reports from the external and internal auditors
- Reviewed and approved internal and external audit plans, terms of engagement and fees, as well as the nature and extent of non-audit services rendered by the external auditors
- Considered the appropriateness and expertise of the financial director, Frank Abbott, as well as that of the finance function – both were found to be adequate and appropriate
- Oversaw and governed the governance of information technology on behalf of the board and considered whether information technology risks were adequately addressed and whether appropriate controls were in place to address those risks
- Considered and confirmed the company as a going concern and
- Oversaw the process of assurance of the integrated report
- Considered the distribution of a dividend taking into consideration the requirements of section 4 of the Companies Act, No 71 of 2008

The audit and risk committee is confident that it complied with the legal, regulatory and other responsibilities assigned to it by the board, under its terms of reference and in accordance with the Act, the JSE Listings Requirements and King III.

The internal audit function reports directly to the audit and risk committee, except on administrative matters about which it reports to the executive: risk management and services improvement. The internal and external auditors attend the committee's quarterly meetings and have unrestricted access to the chairman of the committee. The audit and risk committee met privately with the internal and external auditors during FY16.

Post year-end, upon recommendation from the committee, the board approved:

- The Annual Financial Statements and Summarised Consolidated Financial Statements for the year ended 30 June 2016
- The Integrated Annual Report for the year ended 30 June 2016, in accordance with King III and the JSE Listings Requirements
- The annual report filed on Form 20-F for the year ended 30 June 2016 for subsequent submission to the United States Securities and Exchange Commission
- The notice of the annual general meeting to be held on 25 November 2016

For more on the committee and its activities during FY16 see Corporate Governance.

John Wetton

Chairman: audit and risk committee

26 October 2016

SHAREHOLDER INFORMATION

CONTACTS

Executive: Corporate and Investor Relations Marian van der Walt Telephone: +27 11 411 2037 Fax: +27 86 614 0999 Mobile: +27 82 888 1242 Email: marian@harmony.co.za	**Investor relations queries** Email: harmonyIR@harmony.co.za **General enquiries:** E-mail: corporate@harmony.co.za Harmony website: www.harmony.co.za

STOCK EXCHANGE LISTINGS AND TICKER CODES

Harmony's primary listing is on the JSE Limited. It is also quoted in the form of American depositary receipts on the New York Stock Exchange and as international depositary receipts on the Berlin exchange.

Harmony's ticker codes on these exchanges are as follows:

JSE Limited	HAR
New York Stock Exchange Euronext	HMY
Berlin Stock Exchange	HAM1

SHARE INFORMATION

Sector	Resources
Sub-sector	Gold
Issued share capital as at 30 June 2016	437 299 479 shares in issue
Market capitalisation	
at 30 June 2016	R22.9 billion or US$1.6 billion
at 30 June 2015	R6.8 billion or US$560 million
Share price statistics – FY16	
Johannesburg Stock Exchange: 12-month high	R62.89
12-month low	R7.92
Closing price as at 30 June 2016	R52.47
New York Stock Exchange: 12-month high	US$4.17
12-month low	US$0.53
Closing price as at 30 June 2016	US$3.61
Free float	100%
ADR ratio	1:1

SHAREHOLDER SPREAD AS AT 30 JUNE 2016

Shareholder spread	Number of shareholders	% of shareholders	Number of shares	% of issued share capital
Public	**8 608**	**99.87**	**182 283 005**	**41.68**
Non-public	**11**	**0.13**	**255 016 474**	**58.32**
Share option scheme	5	0.06	611 650	0.14
Holding 10% +	2	0.02	253 746 138	58.03
Directors*	4	0.05	658 686	0.15
Totals	**8 619**	**100.00**	**437 299 479**	**100.00**

** Held by Frank Abbott, Graham Briggs#, Ken Dicks, Mashego Mashego and André Wilkens*

 # Director and chief executive officer until 31 December 2015

Analysis of ordinary shares	**Number of shareholders**	**% of shareholders**	**Number of shares**	**% of issued share capital**
Range				
1 – 10 000	8 135	94.38	4 407 414	1.01
10 001 – 100 000	328	3.81	11 884 500	2.72
100 001 – 1 000 000	122	1.42	40 134 151	9.18
1 000 001 – And more	34	0.39	380 873 414	87.10
Totals	**8 619**	**100.00**	**437 299 479**	**100.00**

Ownership summary as at 30 June 2016 – top 10 shareholders

Rank	Institution	% Total shares outstanding 30 June 2016
1	African Rainbow Minerals Ltd	14.55
2	Allan Gray Unit Trust Management Ltd.	12.04
3	Van Eck Global	10.77
4	Retail investors (North America)	7.99
5	Public Investment Corp. of South Africa	7.79
6	Dimensional Fund Advisors, Inc.	3.29
7	Renaissance Technologies LLC	2.83
8	Retail investors (Europe)	2.68
9	The Vanguard Group, Inc.	2.62
10	Universal-Investment GmbH	2.25

DIVIDEND POLICY

In considering the payment of dividends, the board will, with the assistance of the audit and risk and investment committees, take into account the following:

- The current financial status of the company and the payment of a proposed dividend subject to the successful application of the solvency and liquidity test as set out in section 4 of the Companies Act of 2008
- The future funding and capital requirements of the company
- The intention to pay a dividend

Dividend declared

A dividend of 50 South African cents per share (4 US cents per share) was declared for FY16. Harmony's stated dividend policy is to only pay dividends from profits and not from debt.

SHAREHOLDERS' DIARY

Financial year-end	30 June	**Results presentations FY17**	
Annual financial statements issued	26 October 2016	Interim results for the half-year	3 February 2017
Form 20-F issued	26 October 2016	Full-year results	17 August 2017
Annual general meeting	25 November 2016		

DIRECTORATE AND ADMINISTRATION

HARMONY GOLD MINING COMPANY LIMITED

Harmony Gold Mining Company Limited was incorporated and registered as a public company in South Africa on 25 August 1950

Registration number: 1950/038232/06

Corporate office

Randfontein Office Park
PO Box 2, Randfontein, 1760
South Africa
Corner Main Reef Road and Ward Avenue
Randfontein, 1759
South Africa

Telephone: +27 11 411 2000
Website: www.harmony.co.za

DIRECTORS

PT Motsepe* (chairman)
FFT De Buck*^ (lead independent director)
JM Motloba*^ (deputy chairman)
PW Steenkamp (chief executive officer)
F Abbott (financial director)
JA Chissano*[1]^
KV Dicks*^
Dr DSS Lushaba*^
CE Markus*^
HE Mashego**
M Msimang*^
KT Nondumo*^
VP Pillay*^
JL Wetton*^
AJ Wilkens*

* *Non-executive*
** *Executive*
^ *Independent*
[1] *Mozambican*

INVESTOR RELATIONS

E-mail: harmonyIR@harmony.co.za

Marian van der Walt

Executive: Corporate and Investor Relations
Telephone: +27 11 411 2037
Fax: +27 86 614 0999
Mobile: +27 82 888 1242
E-mail: marian@harmony.co.za

COMPANY SECRETARY

Riana Bisschoff

Telephone: +27 11 411 6020
Fax: +27 11 696 9734
Mobile: +27 83 629 4706
E-mail: riana.bisschoff@harmony.co.za

TRANSFER SECRETARIES

Link Market Services South Africa
(Proprietary) Limited
(Registration number 2000/007239/07)
13th Floor, Rennie House,
Ameshoff Street, Braamfontein
PO Box 4844
Johannesburg, 2000
South Africa

Telephone: +27 86 154 6572
E-mail: info@linkmarketservices.co.za
Fax: +27 86 674 2450

ADR* DEPOSITARY

Deutsche Bank Trust Company Americas c/o American Stock Transfer and Trust Company
Peck Slip Station
PO Box 2050
New York, NY 10272-2050
E-mail queries: db@amstock.com

Toll free: +1-800-937-5449
Int: +1-718-921-8137
Fax: +1-718-765-8782

**ADR: American Depositary Receipts*

SPONSOR

JP Morgan Equities South Africa (Pty) Ltd
1 Fricker Road, corner Hurlingham Road
Illovo, Johannesburg, 2196
Private Bag X9936, Sandton, 2146

Telephone: +27 11 507 0300
Fax: +27 11 507 0503

TRADING SYMBOLS

JSE Limited: HAR
New York Stock Exchange, Inc.: HMY
Berlin Stock Exchange: HAM1
ISIN: ZAE 000015228

Exhibit 99.1: Consolidated Financial Statements 2016 dated October 26, 2016

Index to Financial Statements

Report of Independent Registered Public Accounting Firm

To the Board of Directors and Shareholders of Harmony Gold Mining Company Limited

In our opinion, the accompanying consolidated balance sheets and the related consolidated income statements, statements of comprehensive income, statements of changes in shareholders' equity and cash flow statements present fairly, in all material respects, the financial position of Harmony Gold Mining Company Limited and its subsidiaries at June 30,2016 and 2015, and the results of their operations and their cash flows for each of the three years in the period ended June 30, 2016 in conformity with International Financial Reporting Standards as issued by the International Accounting Standards Board. Also in our opinion, the company maintained, in all material respects, effective internal control over financial reporting as of June 30, 2016, based on criteria established in Internal Control - Integrated Framework (2013 Framework) issued by the Committee of Sponsoring Organizations of the Treadway Commission (COSO). The Company's management is responsible for these financial statements, for maintaining effective internal control over financial reporting and for its assessment of the effectiveness of internal control over financial reporting, included in Management's Annual Report on Internal Control over Financial Reporting appearing under Item 15 (b).

Our responsibility is to express opinions on these financial statements and on the Company's internal control over financial reporting based on our integrated audits. We conducted our audits in accordance with the standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audits to obtain reasonable assurance about whether the financial statements are free of material misstatement and whether effective internal control over financial reporting was maintained in all material respects. Our audits of the financial statements included examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements, assessing the accounting principles used and significant estimates made by management, and evaluating the overall financial statement presentation. Our audit of internal control over financial reporting included obtaining an understanding of internal control over financial reporting, assessing the risk that a material weakness exists, and testing and evaluating the design and operating effectiveness of internal control based on the assessed risk. Our audits also included performing such other procedures as we considered necessary in the circumstances. We believe that our audits provide a reasonable basis for our opinions.

A company's internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles. A company's internal control over financial reporting includes those policies and procedures that (i) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the company; (ii) provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with generally accepted accounting principles, and that receipts and expenditures of the company are being made only in accordance with authorizations of management and directors of the company; and (iii) provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use, or disposition of the company's assets that could have a material effect on the financial statements.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness to future periods are subject to the risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

/s/ PricewaterhouseCoopers Inc.
Johannesburg, Republic of South Africa
26 October 2016

GROUP INCOME STATEMENTS

for the years ended 30 June 2016

		US dollar		
Figures in million	Notes	2016	2015	2014
Revenue		**1 264**	1 348	1 515
Cost of sales	5	**(1 088)**	(1 645)	(1 549)
Production costs		**(914)**	(1 103)	(1 148)
Amortisation and depreciation		**(149)**	(216)	(207)
Reversal of impairment/(impairment) of assets		**3**	(285)	(135)
Employment termination and restructuring costs		**(1)**	(22)	(26)
Other items		**(27)**	(19)	(33)
Gross profit/(loss)		**176**	(297)	(34)
Corporate, administration and other expenditure		**(28)**	(33)	(42)
Social investment expenditure		**(4)**	(6)	(9)
Exploration expenditure		**(13)**	(23)	(44)
Loss on scrapping of property, plant and equipment	13	**(4)**	(42)	-
Foreign exchange translation loss (net)	6	**(13)**	(32)	(18)
Other income/(expenses) (net)	7	**(3)**	-	1
Operating profit/(loss)	8	**111**	(433)	(146)
Loss from associates	19	**-**	(2)	(10)
Profit on disposal of investments		**-**	-	1
Net gain on financial instruments	16	**1**	1	16
Investment income	9	**16**	20	21
Finance cost	10	**(19)**	(22)	(27)
Profit/(loss) before taxation		**109**	(436)	(145)
Taxation	11	**(43)**	62	27
Net profit/(loss) for the year		**66**	(374)	(118)
Attributable to:				
Owners of the parent		**66**	(374)	(118)
Non-controlling interest		**-**	-	-
Earnings/(loss) per ordinary share (cents)				
Total earnings/(loss)	12	**15**	(86)	(27)
Diluted earnings/(loss) per ordinary share (cents)				
Total diluted earnings/(loss)	12	**15**	(86)	(27)

The accompanying notes are an integral part of these consolidated financial statements.

GROUP STATEMENTS OF COMPREHENSIVE INCOME

for the years ended 30 June 2016

		US dollar		
Figures in million	Notes	**2016**	2015	2014
Net profit/(loss) for the year		**66**	(374)	(118)
Other comprehensive income/(loss) for the year, net of income tax		**(375)**	(367)	(209)
Items that may be reclassified subsequently to profit or loss		**(375)**	(368)	(206)
Foreign exchange translation gain/(loss)	23	**(375)**	(368)	(206)
Gain on fair value movement of available-for-sale investments	23	**-**	-	1
Movement on available-for-sale investments recognised in profit or loss	23	**-**	-	(1)
Items that will not be reclassified to profit or loss		**-**	1	(3)
Remeasurement of retirement benefit obligation				
Actuarial gain/(loss) recognised during the year	25	**-**	1	(4)
Deferred taxation thereon		**-**	-	1
Total comprehensive income/(loss) for the year		**(309)**	(741)	(327)
Attributable to:				
Owners of the parent		**(309)**	(741)	(327)
Non-controlling interest		**-**	-	-

The accompanying notes are an integral part of these consolidated financial statements.

GROUP BALANCE SHEETS

		US dollar	
Figures in million	Notes	**At 30 June 2016**	At 30 June 2015
ASSETS			
Non-current assets			
Property, plant and equipment	13	**2 033**	2 430
Intangible assets	14	**59**	73
Restricted cash	15	**4**	4
Restricted investments	16	**170**	196
Inventories	21	**3**	3
Trade and other receivables	18	**12**	7
Total non-current assets		**2 281**	2 713
Current assets			
Inventories	21	**79**	106
Restricted cash	15	**1**	1
Trade and other receivables	18	**44**	62
Income and mining taxes		**-**	2
Derivative financial assets	17	**25**	-
Cash and cash equivalents		**85**	88
Total current assets		**234**	259
Total assets		**2 515**	2 972
EQUITY AND LIABILITIES			
Share capital and reserves			
Share capital	22	**4 036**	4 035
Other reserves	23	**(1 591)**	(1 238)
Accumulated loss		**(531)**	(597)
Total equity		**1 914**	2 200
Non-current liabilities			
Deferred tax liabilities	11	**164**	157
Provision for environmental rehabilitation	24	**148**	182
Retirement benefit obligation	25	**11**	13
Other non-current liabilities	26	**1**	3
Borrowings	27	**139**	280
Total non-current liabilities		**463**	635
Current liabilities			
Borrowings	27	**20**	-
Income and mining taxes		**3**	-
Trade and other payables	28	**115**	137
Total current liabilities		**138**	137
Total equity and liabilities		**2 515**	2 972

The accompanying notes are an integral part of these consolidated financial statements.

GROUP STATEMENTS OF CHANGES IN SHAREHOLDERS' EQUITY

for the years ended 30 June 2016

Figures in million (US dollar)	Number of ordinary shares issued	Share capital	Share premium	Accumulated loss	Other reserves	Total
Notes	22	22			23	
Balance - 30 June 2013	435 289 890	33	4 002	(105)	(701)	3 229
Issue of shares						
- Exercise of employee share options	535 557	-	-	-	-	-
Share-based payments	-	-	-	-	23	23
Net loss for the year	-	-	-	(118)	-	(118)
Other comprehensive income for the year	-	-	-	-	(209)	(209)
Balance - 30 June 2014	435 825 447	33	4 002	(223)	(887)	2 925
Issue of shares						
- Exercise of employee share options	361 686	-	-	-	-	-
Share-based payments	-	-	-	-	16	16
Net loss for the year	-	-	-	(374)	-	(374)
Other comprehensive loss for the year	-	-	-	-	(367)	(367)
Balance - 30 June 2015	436 187 133	33	4 002	(597)	(1 238)	2 200
Issue of shares						
- Exercise of employee share options	**1 077 346**	**-**	**-**	**-**	**-**	**-**
- Share issued to the Tlhakanelo Employee Share Trust	**35 000**	**-**	**-**	**-**	**-**	**-**
Share-based payments	**-**	**-**	**-**	**-**	**22**	**22**
Reversal of provision for odd lot repurchases	**-**	**-**	**1**	**-**	**-**	**1**
Net profit for the year	**-**	**-**	**-**	**66**	**-**	**66**
Other comprehensive income for the year	**-**	**-**	**-**	**-**	**(375)**	**(375)**
Balance - 30 June 2016	**437 299 479**	**33**	**4 003**	**(531)**	**(1 591)**	**1 914**

The accompanying notes are an integral part of these consolidated financial statements.

GROUP CASH FLOW STATEMENTS

for the years ended 30 June 2016

Figures in million	Notes	US dollar 2016	2015	2014
CASH FLOW FROM OPERATING ACTIVITIES				
Cash generated by operations	29	**322**	168	218
Interest received		**5**	9	13
Interest paid		**(11)**	(9)	(12)
Income and mining taxes refunded/(paid)		**(4)**	8	-
Cash generated by operating activities		**312**	176	219
CASH FLOW FROM INVESTING ACTIVITIES				
(Increase)/decrease in restricted cash		**(1)**	1	(1)
(Increase)/decrease in amounts invested in restricted investments		**3**	2	(2)
Proceeds on disposal of investments		**-**	-	5
Loan to associate advanced	19	**-**	(10)	-
Loan to ARM BBEE Trust	18	**(14)**	-	-
Proceeds on disposal of property, plant and equipment		**-**	1	-
Additions to intangible assets		**-**	(1)	(1)
Additions to property, plant and equipment		**(168)**	(246)	(256)
Cash utilised by investing activities		**(180)**	(253)	(255)
CASH FLOW FROM FINANCING ACTIVITIES				
Borrowings raised	27	**24**	80	60
Borrowings paid	27	**(138)**	(65)	(44)
Cash generated/(utilised) by financing activities		**(114)**	15	16
Foreign currency translation adjustments		**(21)**	(22)	(17)
Net increase/(decrease) in cash and cash equivalents		**(3)**	(84)	(37)
Cash and cash equivalents - beginning of year		**88**	172	209
Cash and cash equivalents - end of year		**85**	88	172

The accompanying notes are an integral part of these consolidated financial statements.

NOTES TO THE GROUP FINANCIAL STATEMENTS

for the years ended 30 June 2016

1 GENERAL INFORMATION

Harmony Gold Mining Company Limited (the company) and its subsidiaries (collectively Harmony or the group) are engaged in gold mining and related activities, including exploration, extraction and processing. Gold bullion, the group's principal product, is currently produced at its operations in South Africa and Papua New Guinea (PNG).

The company is a public company, incorporated and domiciled in South Africa. The address of its registered office is Randfontein Office Park, Corner Main Reef Road and Ward Avenue, Randfontein, 1759.

The consolidated financial statements were authorised for issue by the board of directors on 26 October 2016.

2 ACCOUNTING POLICIES

BASIS OF PREPARATION

The principal accounting policies applied in the preparation of the consolidated financial statements have been consistently applied in all years presented. No new standards, amendments to standards or interpretations to existing standards were adopted by the group during the financial year.

The consolidated financial statements have been prepared on a going concern basis.

The financial statements of the group have been prepared in accordance with International Financial Reporting Standards as issued by the International Accounting Standards Board (IASB) and IFRIC Interpretations (collectively IFRS).

RECENT ACCOUNTING DEVELOPMENTS

New standards, amendments to standards and interpretations to existing standards that are not yet effective and have not been early adopted

At the date of authorisation of these financial statements, the standards, amendments to standards and interpretations listed below were in issue but not yet effective. These new standards and interpretations have not been early adopted by the group and the group plans on adopting these standards, amendments to standards and interpretations on the dates when they become effective.

The effective dates below are for the financial periods beginning on or after the given date.

The following standards or amendments to standards are not relevant to the group:

Pronouncement	Title	Effective date
IFRS 14	*Regulatory Deferral Accounts*	1 January 2016
IFRS 10 and IAS 28 (Amendments)	*Consolidated Financial Statements and Investments in Associates and Joint Ventures -* Investment entities	1 January 2016
IAS 16 and IAS 38 (Amendments)	*Property, Plant and Equipment and Intangible Assets –* Clarification of acceptable methods of depreciation and amortisation	1 January 2016
IAS 16 and IAS 41 (Amendments)	*Amendments to Property, Plant and Equipment and Agriculture –* Bearer plants	1 January 2016
IAS 27 (Amendments)	*Separate Financial Statements*	1 January 2016

The following standards or amendments to standards are not expected to have an impact on the results of the group but will affect the disclosure in the financial statements:

Pronouncement	Title	Effective date
IAS 1 (Amendments)	*Presentation of Financial Statements*	1 January 2016
IAS 7 (Amendments)	*Statement of Cash Flows*	1 January 2017

The following standards, amendments to standards and interpretations to existing standards may possibly have an impact on the group:

Pronouncement	Title	Effective date
IFRS 2 (Amendments)	*Share-Based Payment* - Classification and Measurement of Share-Based Payment Transactions The amendments, which were developed through the IFRS Interpretations Committee, provide requirements on the accounting for: a. the effects of vesting and non-vesting conditions on the measurement of cash-settled share-based payments; b. share-based payment transactions with a net settled feature for withholding tax obligations; and c. a modification to the terms and conditions of a share-based payment that changes the classification of the transaction from cash-settled to equity-settled. The impact of the amendment is currently being assessed by management.	1 January 2018

2 ACCOUNTING POLICIES continued

RECENT ACCOUNTING DEVELOPMENTS continued

The following standards, amendments to standards and interpretations to existing standards may possibly have an impact on the group: continued

Pronouncement	Title	Effective date
IFRS 9	*Financial Instruments* This standard on classification and measurement of financial assets and financial liabilities will replace IAS 39, *Financial Instruments: Recognition and Measurement*. IFRS 9 has two measurement categories: amortised cost and fair value. All equity instruments are measured at fair value. A debt instrument is measured at amortised cost only if the entity is holding it to collect contractual cash flows and the cash flows represent principal and interest. The standard introduces a fair value through other comprehensive income category for certain debt instruments, where part of a fair value change due to an entity's own credit risk is recorded in other comprehensive income rather than the income statement. Hedge accounting The new requirements in IFRS 9 align hedge accounting more closely with risk management, and establishes a more principles-based approach to hedge accounting and addresses inconsistencies and weaknesses in the current model in IAS 39. Expected credit losses IFRS 9 introduces a new model for the recognition of impairment losses – the expected credit losses (ECL) model. The new rules mean that entities will have to record a day 1 loss equal to the 12-month ECL on initial recognition of financial assets that are not credit impaired (or lifetime ECL for trade receivables). IFRS 9 contains a 'three stage' approach which is based on the change in credit quality of financial assets since initial recognition. The stages dictate how an entity measures impairment losses and applies the effective interest rate method. Disclosures Extensive disclosures are required, including reconciliations from opening to closing amounts of the ECL provision, assumptions and inputs and a reconciliation on transition of the original classification categories under IAS 39 to the new classification categories in IFRS 9. The impact of the standard is currently being assessed by management. The standard would affect the classification and measurement of financial instruments, however, the initial assessment indicates that the standard would not have a significant impact on the financial statements based on the group's existing financial instruments at year end.	1 January 2018
IFRS 10 and IAS 28 (Amendments)	*Consolidated Financial Statements and Investments in Associates and Joint Ventures* The main consequence of the amendments is that a full gain or loss is recognised when a transaction involves a business (whether it is housed in a subsidiary or not). A partial gain or loss is recognised when a transaction involves assets that do not constitute a business, even if these assets are housed in a subsidiary. The impact of the amendment is currently being assessed by management. Initial assessments indicate that the standard would not have an impact on the financial statements.	Date to be determined at a later stage
IFRS 11 (Amendments)	*Joint Arrangements* - Acquisitions of interests in joint operations Amends IFRS 11 *Joint Arrangements* to require an acquirer of an interest in a joint operation in which the activity constitutes a business (as defined in IFRS 3 *Business Combinations*) to: Apply all of the business combinations accounting principles in IFRS 3 and other IFRSs, except for those principles that conflict with guidance in IFRS 11; Disclose the information required by IFRS 3 and either IFRSs for business combinations. The amendments apply both to the initial acquisition of an interest in joint operation, and the acquisition of an additional interest in a joint operation (in the latter case, previously held interests are not remeasured). The impact of the amendment is currently being assessed by management. Initial assessments indicate that the amendment would have an impact on the financial statements if the group were to acquire an initial or additional interest in a joint operation.	1 January 2016

2 ACCOUNTING POLICIES continued

RECENT ACCOUNTING DEVELOPMENTS continued

The following standards, amendments to standards and interpretations to existing standards may possibly have an impact on the group: continued

Pronouncement	Title	Effective date
IFRS 15	*Revenue from Contracts with Customers* The core principle is that revenue must be recognised when goods or services are transferred to the customer, at the transaction price. The most significant changes that flow from the principle are: 1. Any bundled goods or services that are distinct must be separately recognised, and any discounts or rebates on the contract price must generally be allocated to the separate elements. 2. Revenue may be recognised earlier than under current standards if the consideration varies for any reasons (such as for incentives, rebates, performance fees, royalties, success of an outcome etc.) - minimum amounts must be recognised if they are not at significant risk of reversal. 3. The point at which revenue is able to be recognised may shift: some revenue which is currently recognised at a point in time at the end of a contract may now be recognised over the contract term and vice versa. The impact of the standard is currently being assessed by management. Initial assessments indicate that the standard would not have a significant impact on the financial statements based on the group's existing operations and processes in place.	1 January 2018
IFRS 16	*Leases* This standard replaces the current guidance in IAS 17, as well as IFRIC 4. The new standard requires lessees to recognise a lease liability reflecting future lease payments and a 'right-of-use asset' for virtually all lease contracts (with limited exceptions), whereas previously, lessees were required to make a distinction between a finance lease (on balance sheet) and an operating lease (off balance sheet). For lessors, the accounting stays almost the same. However, as the IASB has updated the guidance on the definition of a lease (as well as the guidance on the combination and separation of contracts), lessors will also be affected by the new standard. The new accounting model for lessees is expected to impact negotiations between lessors and lessees. Under IFRS 16, a contract is, or contains, a lease if the contract conveys the right to control the use of an identified asset for a period of time in exchange for consideration. The impact of the standard is currently being assessed by management.	1 January 2019
IFRSs	*Annual Improvements 2012-2014 cycle* IFRS 5 – *Non-current Assets Held for Sale and Discontinued Operations* – Addresses changes in methods of disposal. IFRS 7 – *Financial Instruments* : *Disclosures* – Addresses servicing contracts and the applicability of the amendments to IFRS 7 to condensed interim financial statements. IFRS 19 – *Employee Benefits* – Addresses issues related to regional markets when determining discount rates. IFRS 34 – *Interim Financial Reporting* – Addresses disclosure of information 'elsewhere in the interim financial report'. The impact of the improvements are currently being assessed by management. Initial assessments indicate that the improvements would not have a significant impact on the financial statements.	1 January 2016
IAS 12 (Amendments)	*Income taxes* - Recognition of deferred tax assets for unrealised losses These amendments clarify how to account for deferred tax assets related to debt instruments measured at fair value, as well as deferred tax where an asset is measured at fair value and that fair value is below the asset's tax base. The impact of the amendment is currently being assessed by management.	1 January 2017

MEASUREMENT BASIS

The financial statements have been prepared under the historical cost convention, as modified by the revaluation of available-for-sale financial assets, financial assets and financial liabilities at fair value through profit or loss and cash-settled share-based payments.

GROUP ACCOUNTING POLICIES

Accounting policies are included in the relevant notes to the consolidated financial statements and have been highlighted in grey shading in the notes to the group financial statements. The accounting policies below are applied throughout the financial statements:

2.1 Consolidation

The group recognises that control is the single basis for consolidation for all types of entities in accordance with IFRS 10 - *Consolidated Financial Statements* .

The consolidated financial information includes the financial statements of the company, its subsidiaries, interest in associates and joint arrangements and structured entities. Where the group has no control over an entity, that entity is not consolidated.

2 ACCOUNTING POLICIES continued

GROUP ACCOUNTING POLICIES continued

2.1 Consolidation continued

Control

The group, regardless of the nature of its involvement with an entity, shall determine whether it is a parent by assessing whether it controls the investee.

The group controls an entity when it is exposed, or has rights, to variable returns from its involvement with the entity and has the ability to affect those returns through its power over the entity.

(i) Subsidiaries

Subsidiaries are entities over which the group has control. Subsidiaries are fully consolidated from the date on which control is transferred to the group up until when that control ceases.

Intercompany transactions, balances and unrealised gains on transactions between group companies are eliminated. Unrealised losses are also eliminated. Accounting policies of subsidiaries have been changed to ensure consistency with the policies adopted by the group.

The group uses the acquisition method of accounting to account for business combinations. The consideration transferred for the acquisition of a subsidiary is the fair value of the assets transferred, liabilities incurred and the equity interests issued by the group. The consideration transferred includes the fair value of any asset or liability resulting from a contingent consideration arrangement. Acquisition-related costs are expensed as incurred. Identifiable assets acquired and liabilities and contingent liabilities assumed in a business combination are measured initially at their fair values at the acquisition date. On an acquisition-by-acquisition basis, the group recognises any non-controlling interests in the acquiree either at fair value or at the non-controlling interest's proportionate share of the acquiree's net assets.

The excess of the sum of the consideration transferred, the amount of any non-controlling interest in the acquiree and the acquisition-date fair value of any previous equity interest in the acquiree over the fair value of the group's share of the identifiable net assets acquired is recorded as goodwill. If this is less than the fair value of the net assets of the subsidiary acquired, in the case of a bargain purchase, the difference is recognised directly in the income statement.

(ii) Associates

Associates are entities in which the group has significant influence, but not control, over operational and financial policies. This may be when there is a shareholding of between 20% and 50% of the voting rights or when significant influence can be otherwise demonstrated, for example where the group has the right of representation on the board of directors of the entity.

Investments in associates are accounted for by using the equity method of accounting, and are initially recognised at cost. The group's investment in associates includes goodwill identified on acquisition. Cumulative post-acquisition movements are adjusted against the carrying amount of the investment. The group's share of the associates' post-acquisition profits or losses is recognised in the income statement, and its share of post-acquisition movement in reserves is recognised in other reserves.

When the group's share of losses in an associate equals or exceeds its interest in the associate, the group does not recognise further losses, unless it has incurred obligations or made payments on behalf of the associate.

If an associate is acquired in stages, the cost of the associate is measured as the sum of the consideration paid for each purchase plus a share of investee's profits and other equity movements. Any acquisition-related costs are treated as part of the investment in associate. Any related goodwill is calculated at each stage of the acquisition based on the consideration paid and the share of fair value of net assets acquired at the date of each acquisition.

Where the previously held interest was classified as an available-for-sale financial instrument, any existing gains or losses recognised in the available-for-sale revaluation reserve are reversed through other comprehensive income. The cost basis of the investment is then further adjusted by including the group's share of profits after dividends, other comprehensive income and other equity movements relating to the previously held interest is accounted for in equity.

The carrying value of an associate is reviewed on a regular basis and, if impairment in the carrying value has occurred, it is written off in the period in which such impairment is identified.

Unrealised gains on transactions between the group and its associates are eliminated to the extent of the group's interest in the associates. Unrealised losses are also eliminated unless the transaction provides evidence of an impairment that should be recognised.

Accounting policies of associates have been reviewed to ensure consistency with the policies adopted by the group.

2 ACCOUNTING POLICIES continued

GROUP ACCOUNTING POLICIES continued

2.1 Consolidation continued

(iii) Joint arrangements

Joint arrangements are arrangements of which two or more parties have joint control and are contractually bound. The joint arrangement can either be a joint operation or a joint venture. A joint operation is a joint arrangement whereby the parties that have joint control of the arrangement and have the right to the assets, and obligations for the liabilities, relating to the arrangement. These parties are called joint operators. A joint venture is a joint arrangement where the parties that have joint control of the arrangement have rights to the net assets of the arrangement. Those parties are called joint venturers.

For interest in joint operations, the group includes its share of the joint operations' individual income and expenses, assets and liabilities and cash flows on a line-by-line basis with similar items in the group's financial statements.

The group recognises the portion of gains or losses on the sale of assets by the group to the joint operation that is attributable to the other joint operators. The group does not recognise its share of profits or losses from the joint operation that result from the purchase of assets by the group from the joint operation until it resells the assets to an independent party. However, if a loss on the transaction provides evidence of a reduction in the net realisable value of current assets or an impairment loss, the loss is recognised immediately.

The group recognises its interest in a joint venture as an investment and accounts for it using the equity accounting method.

(iv) Structured entities

A structured entity is an entity that has been designed so that voting or similar rights are not the dominant factor in deciding who controls the entity, such as when any voting rights relate to administrative tasks only and the relevant activities are directed by means of contractual arrangements.

The accounting treatment for a structured entity will fall into one of the aforementioned categories (i to iii) depending on whether the group has control over that structured entity.

2.2 Foreign currency translation

(i) Functional and presentation currency

Items included in the financial statements of each of the group's entities are measured using the currency of the primary economic environment in which the entity operates (the functional currency).

For translation of the rand financial statement items to US dollar, the average of R14.50 (2015: R11.45) (2014: R10.35) per US$1 was used for income statement items (unless this average was not a reasonable approximation of the cumulative effect of the rates prevailing on the transaction dates, in which case these items were translated at the rate on the date of the transactions) and the closing rate of R14.72 (2015: R12.16) per US$1 for asset and liability items. Equity items were translated at historic rates.

The translation effect from rand to US dollar is included in other comprehensive income in the US dollar financial statements.

References to "A$" refers to Australian currency, "R" to South African currency, "$" or "US$" to United States currency and "K" or "kina" to Papua New Guinean currency.

(ii) Transactions and balances

Foreign exchange gains and losses resulting from the settlement of foreign currency transactions and from the translation to year-end exchange rates of monetary assets and liabilities denominated in foreign currencies are recognised in the income statement. Gains and losses recognised in the income statement are included in the determination of foreign exchange translation gains/losses.

(iii) Group companies

The results and financial position of all group entities (none of which has the currency of a hyperinflationary economy) that have a functional currency different from the presentation currency are translated into the presentation currency as follows:

- Assets and liabilities for each balance sheet presented are translated at the closing rate at the date of that balance sheet while equity items are translated at historic rates;
- Income and expenses for each income statement are translated at average exchange rates (the rate on the date of the transaction is used if the average is not a reasonable rate for the translation of the transaction);
- All resulting exchange differences are recognised as a separate component of other comprehensive income.

On consolidation, exchange differences arising from the translation of the net investment in foreign operations, and of borrowings and other currency instruments designated as hedges of such investments, are taken to other comprehensive income. When a foreign operation is sold or control is otherwise lost, exchange differences that were recorded in other comprehensive income are recognised in profit or loss in the period of the disposal or change in control. Goodwill and fair value adjustments arising on the acquisition of a foreign operation are treated as assets and liabilities of the foreign entity and translated at the closing rate.

2.3 Revenue recognition

The group has determined that gold is its primary product and other metals produced as part of the extraction process are considered to be by-products of gold. Revenue arising from metal sales is only recognised when the significant risks and rewards of ownership have been transferred, neither continuing managerial involvement nor effective control over the metals sold has been retained, the amount of revenue and costs incurred can be measured reliably and it is probable that the economic benefits associated with the sale will flow to the group. These conditions are satisfied when the gold has been delivered in terms of the contract and the sales price fixed, as evidenced by the certificate of sale issued by the refinery. The sales price for the majority of the group's gold is based on the gold spot price according to the afternoon London Bullion Market fixing price for gold on the date the sale is concluded.

Revenue further excludes value-added tax. Revenues from silver and other by-product sales are credited to production costs as a by-product credit.

2 ACCOUNTING POLICIES continued

GROUP ACCOUNTING POLICIES continued

2.4 Exploration expenditure

The group has elected to expense all exploration and evaluation expenditures until it is concluded that the project is technically feasible and commercially viable, and that future economic benefits are therefore probable. The information used to make that determination depends on the level of exploration as well as the degree of confidence in the ore body as set out below.

Exploration and evaluation expenditure on greenfield sites, being those where the group does not have any mineral deposits which are already being mined or developed, is expensed as incurred until the technical and commercial viability of the project has been demonstrated usually through the completion of a final feasibility study. However, in certain instances, the technical and commercial viability of the deposit may be demonstrated at an earlier stage, for example where an extended feasibility study is conducted and the underlying feasibility study in respect of specific components of the mineral deposit has advanced to such a stage that significant commercially viable reserves have been established, and the other criteria for the recognition of an asset have been met.

Exploration and evaluation expenditure on brownfield sites, being those adjacent to mineral deposits which are already being mined or developed, is expensed as incurred until the group is able to demonstrate that future economic benefits are probable through the completion of a feasibility study, after which the expenditure is capitalised as mine development cost. A ‘feasibility study’ consists of a comprehensive study of the viability of a mineral project that has advanced to a stage where the mining method has been established, and which, if an effective method of mineral processing has been determined, includes a financial analysis based on reasonable assumptions of technical, engineering, operating economic factors and the evaluation of other relevant factors. The feasibility study, when combined with existing knowledge of the mineral property that is adjacent to mineral deposits that are already being mined or developed, allows the group to conclude that the project is technically feasible and commercially viable.

Exploration and evaluation expenditure relating to extensions of mineral deposits which are already being mined or developed, including expenditure on the definition of mineralisation of such mineral deposits, is capitalised as a mine development cost following the completion of an economic evaluation equivalent to a feasibility study. This economic evaluation is distinguished from a feasibility study in that some of the information that would normally be determined in a feasibility study is instead obtained from the existing mine or development. This information, when combined with existing knowledge of the mineral property already being mined or developed, allows the directors to conclude that the project is technically feasible and commercially viable.

2.5 Impairment of non-financial assets

Assets that have an indefinite useful life are not subject to amortisation and are tested annually for impairment or when there is an indication of impairment.

Assets that are subject to amortisation are reviewed annually on 30 June for impairment or whenever events or changes in circumstances indicate that the carrying amount may not be recoverable.

An impairment loss is recognised in the income statement for the amount by which the asset’s carrying amount exceeds its recoverable amount. The recoverable amount is the higher of an asset’s fair value less costs to sell and value in use. For the purposes of assessing impairment, assets are grouped at the lowest levels for which there are separately identifiable cash flows (cash-generating units). Each operating shaft, along with allocated common assets such as plants and administrative offices, is considered to be a cash-generating unit as each shaft is largely independent from the cash flows of other shafts and assets belonging to the group.

Fair value less costs to sell is generally determined by using discounted estimated after-tax future cash flows. Future cash flows are estimated based on quantities of recoverable minerals, expected gold prices (considering current and historical prices, price trends and related factors), production levels, capital expenditure and cash costs of production, all based on life-of-mine plans. Future cash flows are discounted to their present value using a post-tax discount rate that reflects current market assessments of the time value of money and risk specific to the asset. Refer to note 13 for detail.

The term “recoverable minerals” refers to the estimated amount of gold that will be obtained from reserves and resources and all related exploration stage mineral interests (except for other mine-related exploration potential and greenfields exploration potential discussed separately below) after taking into account losses during ore processing and treatment. Estimates of recoverable minerals from such related exploration stage mineral interests will be risk adjusted based on management’s relative confidence in such materials.

In estimating future cash flows, assets are grouped at the lowest level for which there are identifiable cash flows that are largely independent of cash flows from other asset groups. With the exception of other mine-related exploration potential and greenfields exploration potential, estimates of future undiscounted cash flows are included on an area of interest basis, which generally represents an individual operating mine, even if the mines are included in a larger mine complex.

In the case of mineral interests associated with other mine-related exploration potential and greenfields exploration potential, cash flows and fair values are individually evaluated based primarily on recent exploration results and recent transactions involving sales of similar properties, if any. Assumptions underlying future cash flow estimates are subject to significant risks and uncertainties.

Impairment losses on goodwill are recognised immediately in the income statement and are not reversed. The impairment testing is performed annually on 30 June or when events or changes in circumstances indicate that it may be impaired.

Non-financial assets other than goodwill that suffered an impairment are reviewed annually for possible reversal of the impairment at 30 June. Reversal of impairments is also considered when there is objective evidence to indicate that the asset is no longer impaired. Where an impairment subsequently reverses, the carrying amount of the asset or CGU is increased to the revised estimate of its recoverable amount, but not higher than the carrying value that would have been determined had no impairment been recognised in prior years.

3 CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS

The preparation of the financial statements in conformity with IFRS requires the group's management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements, and the reported amounts of revenues and expenses during the reporting period. Actual results could differ from those estimates.

Estimates and judgements are continually evaluated and are based on historical experience and other factors, including expectations of future events that are believed to be reasonable under the circumstances.

The resulting accounting estimates may differ from actual results. The areas involving a higher degree of judgement or complexity, or areas where assumptions and estimates are significant to the group financial statements are:

- Estimate of taxation – note 11;
- Gold mineral reserves and resources – note 13;
- Production start date – note 13;
- Impairment of assets – note 13;
- Depreciation of property, plant and equipment – note 13;
- Impairment of goodwill – note 14;
- Valuation of derivative assets - note 17;
- Valuation of loans receivable - note 18;
- Valuation of interest in associate – note 19;
- Estimate of exposure and liabilities with regard to rehabilitation costs – note 24;
- Estimate of employee benefit liabilities – note 25;
- Valuation of certain non-current liabilities - note 26;
- Fair value of share-based payments – note 31;
- Assessment of contingencies – note 33.

Please refer to the specific notes for further information on the key accounting estimates and assumptions applied.

4 FINANCIAL RISK MANAGEMENT

The group's financial instruments expose it to a variety of financial risks: market risk (including currency risk, cash flow interest rate risk and other price risk), credit risk and liquidity risk. The group may use derivative financial instruments to hedge certain risk exposures.

The group's financial assets and liabilities are set out below:

Figures in million (US dollars)	Loans and receivables	Available-for-sale financial assets	Held-to-maturity investments	Fair value through profit or loss	Financial liabilities at amortised cost
At 30 June 2016					
Financial assets					
Restricted cash	**5**	**-**	**-**	**-**	**-**
Restricted investments	**-**	**-**	**126**	**44**	**-**
Other non-current receivables	**12**	**-**	**-**	**-**	**-**
Derivative financial assets	**-**	**-**	**-**	**25**	**-**
Trade and other receivables	**26**	**-**	**-**	**-**	**-**
Cash and cash equivalents	**85**	**-**	**-**	**-**	**-**
Financial liabilities					
Borrowings	**-**	**-**	**-**	**-**	**159**
Other non-current liabilities	**-**	**-**	**-**	**-**	**1**
Trade and other payables	**-**	**-**	**-**	**-**	**29**
At 30 June 2015					
Financial assets					
Restricted cash	5	-	-	-	-
Restricted investments	39	-	113	44	-
Trade and other receivables	52	-	-	-	-
Cash and cash equivalents	88	-	-	-	-
Financial liabilities					
Borrowings	-	-	-	-	280
Other non-current liabilities	-	-	-	-	2
Trade and other payables	-	-	-	-	48

Risk management is carried out by a central treasury department (group treasury) under policies approved by the board of directors. Group treasury identifies, evaluates and hedges certain selected financial risks in close cooperation with the group's operating units. The audit and risk committee and the board provides written principles for overall risk management, as well as written policies covering specific areas, such as foreign exchange risk, interest rate risk, credit risk, use of derivative financial instruments and non-derivative financial instruments, and the investment of excess liquidity.

MARKET RISK

(i) Foreign exchange risk

The group operates internationally and is exposed to foreign exchange risk arising from various currency exposures, primarily with respect to the US dollar (US$). Foreign exchange risk arises from future commercial transactions, recognised assets and liabilities and net investments in foreign operations. Foreign exchange risk arises when future commercial transactions or recognised assets or liabilities are denominated in a currency that is not the entity's functional currency. Harmony's revenues are sensitive to the R/US$ exchange rate as all revenues are generated by gold sales denominated in US$. Harmony generally does not enter into forward sales, derivatives or other hedging arrangements to establish an exchange rate in advance for the sale of its future gold production. See note 34(b) for transactions after the reporting date.

The group is exposed to foreign exchange risk arising from borrowings and cash denominated in a currency other than the functional currency of that entity. Harmony generally does not enter into forward sales, derivatives or other hedging arrangements to manage this risk. During February 2016, Harmony entered into foreign exchange hedging contracts. Refer to note 17 for details of the contracts.

The group has reviewed its foreign currency exposure on financial assets and financial liabilities and has identified the following sensitivities for a 10% change in the exchange rate that would affect profit or loss. Management considers a range between 10% and 20% to be a reasonable change.

	US dollar	
Figures in million	**2016**	2015
Sensitivity analysis - borrowings		
Rand against US$		
Balance at 30 June	**139**	247
Strengthen by 10%	**14**	25
Weaken by 10%	**(14)**	(25)
Closing rate	**14.72**	12.16

4 FINANCIAL RISK MANAGEMENT continued

MARKET RISK continued

(i) Foreign exchange risk continued

Figures in million	US dollar 2016	US dollar 2015
Sensitivity analysis - financial assets		
Rand against US$		
Balance at 30 June	**25**	-
Strengthen by 10%	**32**	-
Weaken by 10%	**(38)**	-
Closing rate	**14.72**	n/a
US$ against Kina		
Balance at 30 June	**14**	6
Strengthen by 10%	**1**	-
Weaken by 10%	**(2)**	(1)
Closing rate	**0.32**	0.37

(ii) Other price risk

The group is exposed to the risk of fluctuations in the fair value of the available-for-sale financial assets and fair value through profit or loss financial assets as a result of changes in market prices (other than changes in interest rates and foreign currencies). Harmony generally does not use any derivative instruments to manage this risk.

Sensitivity analysis

Certain of the restricted investments are linked to the Shareholder Weighted Top 40 Index (SWIX 40) and the Top 40 Index on the JSE. A 1% increase in the SWIX 40 and Top 40 index at the reporting date, with all other variables held constant, would have increased profit or loss by US$0.2 million (2015: US$0.3 million); an equal change in the opposite direction would have decreased profit or loss by US$0.2 million (2015: US$0.1 million). A 1% increase in the share price of the available-for-sale investments at the reporting date, with all other variables held constant, would not have had a material impact on other comprehensive income for 2015 and 2016.

Commodity price sensitivity

The profitability of the group's operations, and the cash flows generated by those operations, are affected by changes in the market price of gold. Harmony generally does not enter into forward sales, derivatives or others hedging arrangements to establish a price in advance for the sale of future gold production. See note 34(b) for transactions after the reporting date.

(iii) Interest rate risk

The group's interest rate risk arises mainly from long-term borrowings. The group has variable interest rate borrowings. Variable rate borrowings expose the group to cash flow interest rate risk. The group has not entered into interest rate swap agreements. Interest rate risk arising from long-term borrowings is offset by cash, restricted cash and restricted investments held at variable rates.

A change of 100 basis points in interest rates at the reporting date would have increased/(decreased) profit or loss before tax by the amounts shown below. This analysis assumes that all other variables remain constant. The analysis is performed on the same basis for 2015.

Figures in million	US dollar 2016	US dollar 2015
Sensitivity analysis - borrowings		
Increase by 100 basis points	**(2)**	(3)
Decrease by 100 basis points	**2**	3
Sensitivity analysis - financial assets		
Increase by 100 basis points	**2**	3
Decrease by 100 basis points	**(2)**	(3)

4 FINANCIAL RISK MANAGEMENT continued

CREDIT RISK

Credit risk is the risk that a counterparty may default or not meet its obligations timeously. Financial instruments, which subject the group to concentrations of credit risk, consist predominantly of restricted cash, restricted investments, derivative financial assets, trade and other receivables (excluding non-financial instruments) and cash and cash equivalents.

Exposure to credit risk on trade and other receivables is monitored on a regular basis. Refer to note 18 for management's assessment. The credit risk arising from restricted cash, cash and cash equivalents and restricted investments is managed by ensuring amounts are only invested with financial institutions of good credit quality. The contracts for derivative financial assets were entered into with counterparties of good credit quality. The group has policies that limit the amount of credit exposure to any one financial institution.

Financial institutions' credit rating by exposure

	US dollar	
Figures in million	**2016**	2015
Cash and cash equivalents		
AA+	**49**	35
AA	**12**	23
AA-	**24**	26
A+	**-**	4
	85	88
Restricted cash		
AA	**2**	3
AA-	**3**	-
A+	**-**	2
	5	5
Restricted investments (environmental trust funds)		
AA+	**51**	41
AA	**100**	136
AA-	**16**	-
A+	**-**	15
	167	192
Derivative financial assets		
AA	**8**	-
AA-	**17**	-
	25	-

The social plan trust fund of US$2.8 million (2015: US$3.8 million) has been invested in unit trusts comprising shares in listed companies.

The group's maximum exposure to credit risk is represented by the carrying amount of all financial assets determined to be exposed to credit risk, amounting to US$322.7 million as at 30 June 2016 (2015: US$341.0 million).

CAPITAL RISK MANAGEMENT

The primary objective of managing the group's capital is to ensure that there is sufficient capital available to support the funding requirements of the group, in a way that optimises the cost of capital and matches the current strategic business plan.

The group manages and makes adjustments to the capital structure, which consists of debt and equity, as and when borrowings mature or when funding is required. This may take the form of raising equity, market or bank debt or hybrids thereof. In doing so, the group ensures it stays within the debt covenants agreed with lenders (refer to note 27 for details on the covenants). The group may also sell assets to reduce debt or schedule projects to manage the capital structure.

The group follows a conservative approach to debt and prefers to maintain low levels of gearing. Net debt is as follows:

	US dollar	
Figures in million	**2016**	2015
Cash and cash equivalents	**85**	88
Borrowings	**(159)**	(280)
Net debt	**(74)**	(192)

There were no changes to the group's approach to capital management during the year.

4 FINANCIAL RISK MANAGEMENT continued

LIQUIDITY RISK

Prudent liquidity risk management implies maintaining sufficient cash and marketable securities, and the availability of funding through an adequate amount of committed credit facilities.

In the ordinary course of business, the group receives cash from its operations and is required to fund working capital and capital expenditure requirements. The cash is managed to ensure that surplus funds are invested in a manner to achieve market-related returns and to provide sufficient liquidity at the minimum risk. The group is able to actively source financing at competitive rates.

The following are the contractual maturities of financial liabilities (including principal and interest payments):

	US dollar	
Figures in million	**Current**	**More than 1 year**
2016		
Other non-current liabilities	**-**	**1**
Borrowings		
Due between 0 to six months	**24**	**-**
Due between six to 12 months	**3**	**-**
Due between one to two years	**-**	**143**
Due between two to five years	**-**	**-**
Trade and other payables (excluding non-financial liabilities)	**29**	**-**
	56	**144**
2015		
Other non-current liabilities	-	2
Borrowings		
Due between 0 to six months	5	-
Due between six to 12 months	5	-
Due between one to two years	-	42
Due between two to five years	-	255
Trade and other payables (excluding non-financial liabilities)	48	-
	58	299

FAIR VALUE DETERMINATION OF FINANCIAL ASSETS AND LIABILITIES

The carrying values (less any impairment allowance) of short-term financial instruments are assumed to approximate their fair values.

The fair value levels of hierarchy are as follows:

(1) Quoted prices (unadjusted) in active markets for identical assets (level 1);

(2) Inputs other than quoted prices included within level 1 that are observable for the asset, either directly (that is, as prices) or indirectly (that is, derived from other prices) (level 2);

(3) Inputs for the asset that are not based on observable market data (that is, unobservable inputs) (level 3).

The following table presents the group's financial assets and liabilities that are measured at fair value by level at the reporting date.

Figures in million (US dollar)	**Fair value hierarchy level**	**At 30 June 2016**	At 30 June 2015
Fair value through profit and loss financial assets			
Restricted investments[1]	**Level 2**	**44**	44
Derivative financial assets[2]	**Level 2**	**25**	-

[1] Level 2 fair values are directly derived from the Shareholders Weighted Top 40 (SWIX 40) or the Top 40 index on the JSE, and are discounted at market interest rate. The fair value of US$2.8 million (2015: US$3.8 million) of the balance in 2016, attributable to the Social Plan Trust, is derived by reference to quoted prices of the shares held within the unit trust portfolio.

[2] The mark-to-market remeasurement of the foreign exchange hedging contracts (zero cost collars) is derived from a Black-Scholes valuation technique, derived from spot rand/US$ exchange rate inputs and discounted at market interest rate.

The fair values of borrowings are not materially different to their carrying amounts since the interest payable on those borrowings is at current market rates. The fair value of borrowings are based on discounted cash flows using a current borrowing rate. The determination of the fair values are level 3 in the fair value hierarchy due to the use of unobservable inputs, including own credit risk.

5 COST OF SALES

Figures in million	2016	2015	2014
	US dollar		
Production costs (a)	**914**	1 103	1 148
Amortisation and depreciation of mining assets	**144**	211	202
Amortisation and depreciation of assets other than mining assets (b)	**5**	5	5
Rehabilitation (credit)/expenditure (c)	**(3)**	(1)	1
Care and maintenance cost of restructured shafts	**8**	9	6
Employment termination and restructuring costs (d)	**1**	22	26
Share-based payments (e)	**23**	18	26
(Reversal of impairment)/impairment of assets (f)	**(3)**	285	135
Other (g)	**(1)**	(7)	-
Total cost of sales	**1 088**	1 645	1 549

(a) Production costs include mine production and transport and refinery costs, applicable general administrative costs, movement in inventories and ore stockpiles, ongoing environmental rehabilitation costs and transfers for stripping activities. Employee termination costs are included, except for employee termination costs associated with major restructuring and shaft closures, which are separately disclosed. Production costs, analysed by nature, consist of the following:

Figures in million	2016	2015	2014
	US dollar		
Labour costs, including contractors	**559**	678	711
Consumables	**230**	303	317
Water and electricity	**148**	175	182
Insurance	**7**	9	11
Transportation	**12**	15	16
Change in inventory	**7**	17	(10)
Capitalisation of mine development costs	**(93)**	(133)	(139)
Stripping activities	**(3)**	(21)	(13)
By-product sales	**(23)**	(18)	(22)
Royalty expense	**12**	8	12
Other	**58**	70	83
Total production costs	**914**	1 103	1 148

(b) Amortisation and depreciation of assets other than mining assets includes the amortisation of intangible assets.

(c) For the assumptions used to calculate the rehabilitation provision, refer to note 24. The total includes the change in estimate for the rehabilitation provision where an asset no longer exists as well as rehabilitation cost. For 2016, US$4.8 million (2015: US$5.8 million) (2014: US$5.1 million) was spent on rehabilitation.

(d) During the 2015 financial year, the group embarked on a restructuring process at Kusasalethu, Masimong and Hidden Valley. Target 3 was placed on care and maintenance and Ernest Oppenheimer Hospital was closed in December 2014. Voluntary severance packages were offered to management in September 2014.

For the 2014 financial year, the programme embarked on by the group's South African operations whereby voluntary severance packages were offered to all employees and significant restructuring process at Hidden Valley, both having started during 2013 was completed in June 2014.

(e) Refer to note 31 for details on the share-based payment schemes implemented by the group.

(f) The (reversal of impairment)/impairment of assets consists of the following:

Figures in million	2016	2015	2014
	US dollar		
Hidden Valley (i)	**32**	174	-
Doornkop (ii)	**(50)**	85	-
Masimong (iii)	**15**	-	-
Phakisa (iv)	**-**	23	130
Freddies 9 (Other - underground) (iv)	**-**	3	-
Steyn 2 (Bambanani) (iv)	**-**	-	3
St Helena (other-underground) (iv)	**-**	-	2
Total (reversal of impairment)/impairment of assets	**(3)**	285	135

(i) For the 2016 financial year, an impairment of US$31.7 million was recognised on Hidden Valley following a change in the life-of-mine plan during the annual planning process. The updated life-of-mine plan for Hidden Valley results in lower production for the 2017 financial year, as the mine will only process ore stockpiles followed by an extended period of care and maintenance, compared to the previous plan. Stripping activities for stage 5 are planned to recommence in the 2018 financial year according to the year-end life-of-mine plan. The recoverable amount of Hidden Valley is US$21.7 million. Refer to note 34(d) for transactions after the reporting date.

For the 2015 financial year, an impairment of US$173.8 million was recognised on Hidden Valley following a change in the life-of-mine plan during the annual planning process. Low commodity prices and high operating costs resulted in the shortening of the life-of-mine of the operation. In 2015, the recoverable amount of Hidden Valley was US$53.7 million.

(ii) For the 2016 financial year, a reversal of US$50.1 million was recognised for Doornkop. The higher recoverable amount for Doornkop, which resulted in the reversal, was mainly due to the increased rand gold price assumption, improvements in operational efficiencies during the 2016 financial year that resulted in increased production levels in the updated life-of-mine plan and new mining areas included in the life-of-mine plan based on additional exploration performed during the year. The recoverable amount of Doornkop is US$190.2 million.

5 COST OF SALES continued

For the 2015 financial year, an impairment of US$85.2 million was recognised. Following the decision to restructure Doornkop in May 2015, a revised life-of-mine plan was completed. This plan included lower production levels and focused on the higher grade areas. In addition, the resource value reduced as resources below the existing shaft infrastructure which were previously included in the additional resource value were removed. The updated plan and lower resource value for 2015 resulted in a lower recoverable amount. In 2015, the recoverable amount of Doornkop was US$151.8 million.

(iii) For the 2016 financial year, an impairment of US$15.6 million was recorded for Masimong, which is a low margin operation and has a remaining life of three years. The exploration programme to locate additional areas of the higher grade B Reef proved unsuccessful and was stopped during the 2016 financial year. In addition, the grade estimation of the Basal Reef decreased and as a result a portion of the resource was abandoned at 30 June 2016. The lower resource value resulted in a lower recoverable amount and the recognition of an impairment. The recoverable amount of Masimong is US$32.1 million.

(iv) For the 2015 financial year, other impairments include US$22.9 million on Phakisa following the annual life-of-mine plan assessments, and US$3.5 million for Freddies 9 as plans to develop the project further were abandoned. In 2015, the recoverable amounts were US$328 million and US$nil for Phakisa and Freddies 9 respectively.

For the 2014 financial year, an impairment of US$130.3 million was recognised on Phakisa. The impairment followed a change in the life-of-mine plan during the annual planning process. The previously planned decline shaft that required significant additional capital expenditure, was removed from the life-of-mine plan. The impairment comprised of US$123.1 million on goodwill and US$7.1 million on mining assets. In 2014, the recoverable amount of Phakisa was US$401.7 million. Impairments on Steyn 2 of US$3.4 million and St Helena of US$2.0 million were recognised following the decision not to mine these operations in future. These operations were impaired to the recoverable amount of US$nil.

The recoverable amounts for these assets have been determined on a fair value less costs to sell basis using the assumptions per note 13 in discounted cash flow models and attributable resource values. These are fair value measurements classified as level 3.

(g) Included in Other for the 2015 financial year is a credit of US$7.6 million relating to the reduction in employees qualifying for post-retirement benefits. Refer to note 25. In addition, amounts relating to non-current inventory adjustments are included in Other for the 2016, 2015 and 2014 financial years. Refer to note 21.

6 FOREIGN EXCHANGE TRANSLATION LOSS (NET)

	US dollar		
Figures in million	**2016**	2015	2014
Translation loss on US$ revolving credit facility (a)	**46**	33	15
Unrealised derivative gain (b)	**(25)**	-	-
Realised derivative gain (b)	**(5)**	-	-
Other	**(3)**	(1)	3
Total foreign exchange translation loss (net)	**13**	32	18

a) Refer to note 27 for details on the US$ revolving credit facility.

b) During February 2016, Harmony entered into foreign exchange hedging contracts (forex hedging contracts) in the form of zero cost collars, which establish a minimum (floor) and maximum (cap) rand/US dollar exchange rate at which to convert US dollars to rands. The nominal value of open forex hedging contracts at 30 June 2016 was US$500 million. The hedging contracts are spread over a 12 month period with a weighted average cap price of US$1=R18.27 and weighted average floor price of US$1=R15.55. The mark-to-market of the derivative asset was US$25.1 million positive as at 30 June 2016. This was due to the strengthening of the rand exchange rate against the US dollar since entering into the forex hedging contracts. The gains have been recorded in the income statement as hedge accounting was not applied. Refer to note 17 for more detail.

7 OTHER INCOME/EXPENSES (NET)

	US dollar		
Figures in million	**2016**	2015	2014
Bad debts provision expense (a)	**2**	1	2
Bad debts written off	**2**	-	-
Profit on sale of property, plant and equipment (b)	**-**	(1)	(3)
Other income - net (c)	**(1)**	-	-
Total other income/expenses (net)	**3**	-	(1)

(a) The total for 2016 includes the reversal of provision for bad debts relating to trade debtors of US$1.9 million that had been written off, which was offset by the provision for the loans to the ARM Broad Based Economic Empowerment Trust (ARM BBEE Trust) of US$2.2 million and Rand Refinery (Pty) Limited (Rand Refinery) of US$1.6 million (2015: US$1.0 million). Refer to note 18 (b) and (c) for further details.

(b) During the 2014 financial year, a ground swap between Joel mine and Sibanye Gold Limited's (Sibanye) Beatrix mine was completed which resulted in a non-cash profit being recognised for the difference between carrying value of the Joel portion and the fair value of the Beatrix portion.

(c) During July 2015, Harmony signed a US$12.0 million guarantee for the ARM BBEE Trust. The guarantee was for additional security for the ARM BBEE Trust's loan to Nedbank Limited (Nedbank). A fair value loss of US$1.0 million was recorded as a result. The guarantee was subsequently cancelled in April 2016 and a gain of US$1.1 million was recorded in investment income. The transaction therefore had a zero effect on the income statement for the 2016 year.

Offsetting the fair value loss is an insurance credit of US$2.1 million for Doornkop.

8 OPERATING PROFIT/LOSS

The following have been included in operating profit/loss:

Figures in million	US dollar 2016	2015	2014
Auditor's remuneration			
Made up as follows:			
External			
Fees - current year	**2**	2	2
Total auditor's remuneration	**2**	2	2

9 INVESTMENT INCOME

ACCOUNTING POLICY

Interest income is recognised on a time proportion basis, taking into account the principal outstanding and the effective rate over the period to maturity, when it is determined that such income will accrue to the group.

Dividend income is recognised when the shareholder's right to receive payment is established. This is recognised at the last date of registration.

Cash flows from dividends and interest received are classified under operating activities in the cash flow statement.

Figures in million	US dollar 2016	2015	2014
Interest income	**16**	20	21
Loans and receivables	**2**	1	2
Held-to-maturity investments	**9**	9	6
Cash and cash equivalents	**5**	9	12
South African Revenue Services (SARS)	**-**	1	1
Total investment income	**16**	20	21

10 FINANCE COST

Figures in million	US dollar 2016	2015	2014
Financial liabilities			
Borrowings	**12**	10	12
Other creditors and liabilities	**-**	-	-
Total finance cost from financial liabilities	**12**	10	12
Non-financial liabilities			
Post-retirement benefits	**1**	1	2
Time value of money and inflation component of rehabilitation costs	**11**	13	13
South African Revenue Services (SARS)	**-**	-	1
Total finance cost from non-financial liabilities	**12**	14	16
Total finance cost before interest capitalised	**24**	24	28
Interest capitalised (a)	**(5)**	(2)	(1)
Total finance cost	**19**	22	27

(a) The capitalisation rate used to determine the amount of borrowing costs eligible for capitalisation in 2016 was 10.5% (2015: 3.4% (2014: 3.4%)).

11 TAXATION

ACCOUNTING POLICY

Taxation is made up of current and deferred taxation. The current income tax charge is calculated on the basis of the tax laws enacted or substantively enacted at the balance sheet date in the countries where the group operates and generates taxable income. Management periodically evaluates positions taken in tax returns with respect to situations in which applicable tax regulations are subject to interpretation and establishes provisions where appropriate on the basis of amounts expected to be paid to the tax authorities.

Deferred taxation is recognised on temporary differences existing at each reporting date between the tax base of all assets and liabilities and their carrying amounts. Substantively enacted tax rates are used to determine future anticipated effective tax rates which in turn are used in the determination of deferred taxation, except to the extent that deferred tax arises from the initial recognition of an asset or liability in a transaction that is not a business combination and does not affect the accounting or taxable profit or loss at the time of the transaction. Deferred tax is charged to profit or loss, except where the tax relates to items recognised in other comprehensive income or directly in equity in which case the tax is also recognised in other comprehensive income or directly in equity. The effect on deferred tax of any changes in tax rates is recognised in the income statement, except to the extent that it relates to items previously charged or credited directly to equity.

The principal temporary differences arise from amortisation and depreciation on property, plant and equipment, provisions, unutilised tax losses and unutilised capital allowances carried forward. Deferred tax assets relating to the carry forward of unutilised tax losses and unutilised capital allowances are recognised to the extent that it is probable that future taxable profit will be available against which the unutilised tax losses and unutilised capital allowances can be utilised. The recoverability of these assets is reviewed at each reporting date and adjusted if recovery is no longer probable.

Deferred income tax is provided on temporary differences arising from investments in subsidiaries, joint ventures and associates, except where the timing of the reversal of the temporary difference is controlled by the group and it is probable that the temporary difference will not reverse in the foreseeable future.

Deferred income tax assets and liabilities are offset when there is a legally enforceable right to offset current tax assets against current tax liabilities and when the deferred income tax assets and liabilities relate to income taxes levied by the same taxation authority on either the taxable entity or different taxable entities where there is an intention to settle the balances on a net basis.

Interest received from and paid to the tax authorities is classified as investment income and finance cost on the income statement.

CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS

The group is subject to income tax in several jurisdictions. Significant judgement is required in determining the worldwide provision for income taxes. There are many transactions and calculations for which the ultimate tax determination is uncertain during the ordinary course of business. Where the final tax outcome is different from the amounts that were initially recorded, such differences will impact the income tax and deferred tax provisions in the period in which such determination is made.

Management has to exercise judgement with regard to deferred tax assets. Where the possibility exists that no future taxable income may flow against which these assets can be offset, the deferred tax assets are not recognised.

Deferred tax assets and liabilities are measured at the tax rates that are expected to apply to the period when the asset is realised or the liability is settled. When different tax rates apply to different levels of taxable income, deferred tax assets and liabilities are measured using the average tax rates that are expected to apply to the taxable profit (tax loss) of the periods in which the temporary differences are expected to reverse. At the group's South African operations, such average tax rates are directly impacted by the profitability of the relevant mine. The deferred tax rate is therefore based on the current estimate of future profitability of an operation when temporary differences will reverse, based on tax rates and tax laws that have been enacted at the balance sheet date. The future profitability of each mine, in turn, is determined by reference to the life-of-mine (LoM) plan for that operation. The LoM plan is influenced by factors as disclosed in note 13, which may differ from one year to the next and normally result in the deferred tax rate changing from one year to the next.

The taxation credit/(expense) for the year is as follows:

	US dollar		
Figures in million	**2016**	2015	2014
SA taxation			
Mining tax (a)	**(3)**	1	(3)
- current year	**(4)**	(1)	(5)
- prior year	**1**	2	2
Non-mining tax (b)	**(5)**	-	1
- current year	**(5)**	-	(1)
- prior year	**-**	-	2
Deferred tax (c)	**(35)**	67	32
- current year	**(35)**	67	32
	(43)	68	30
Foreign taxation			
Deferred tax	**-**	(6)	(3)
- current year (d)	**-**	(1)	(3)
- derecognition of deferred tax asset (e)	**-**	(5)	-
Total taxation credit/(expense)	**(43)**	62	27

11 TAXATION continued

Figures in million	US dollar 2016	2015	2014
Taxation by type			
Mining tax	**(3)**	1	(3)
Non-mining tax	**(5)**	-	1
Deferred tax	**(35)**	61	29
	(43)	62	27

(a) Mining tax on gold mining taxable income in South Africa is determined according to a formula, based on the taxable income from mining operations. 5% of total revenue is exempt from taxation while the remainder is taxable at a higher rate than non-mining income as a result of applying the gold mining formula.

All qualifying mining capital expenditure is deducted from taxable mining income to the extent that it does not result in an assessed loss. Accounting depreciation is eliminated when calculating the South African mining tax income. Excess capital expenditure is carried forward as unredeemed capital to be claimed from future mining taxable income. The group has several tax paying entities in South Africa. In terms of the mining ring-fencing application, each ring-fenced mine is treated separately and deductions can normally only be utilised against mining income generated from the relevant ring-fenced mine.

(b) Non-mining taxable income of mining companies and the taxable income for non-mining companies are taxed at the statutory corporate rate of 28% (2015: 28%) (2014: 28%). The expense in 2016 relates to the non-mining tax arising from the derivative gains (realised and unrealised) recognised on the forex hedging contracts mainly for Freegold (Harmony) Pty Ltd (Freegold) and Avgold Limited (Avgold). Refer to note 6 for details on the derivative gains recorded.

(c) The deferred tax rate used to calculate deferred tax is based on the current estimate of future profitability when temporary differences will reverse based on tax rates and tax laws that have been enacted at the balance sheet date. Depending on the profitability of the operations, the deferred tax rate can consequently be significantly different from year to year.

The deferred tax expense in 2016 is mainly a result of the increase in the average deferred tax rate due to increased estimated profitability at most South African operations, as well as the unwinding of the deferred tax asset related to the utilisation of unredeemed capital expenditure for Freegold against mining taxable income due to increased profitability for Freegold during 2016. Refer below for further details.

(d) Mining and non-mining income of Australian entities and PNG operation are taxed at a standard rate of 30% (2015: 30%) (2014: 30%).

(e) In 2015, the recoverability of the remaining deferred tax asset for Australia was not considered probable, following the revised life-of-mine plan and impairment recognised on Hidden Valley and as a result it was derecognised on 30 June 2015.

INCOME AND MINING TAX RATES

The tax rate remains unchanged for the 2014, 2015 and 2016 years.

Major items causing the group's income tax provision to differ from the South African mining statutory tax rate of 34% (2015: 34%) (2014: 34%) were:

Figures in million	US dollar 2016	2015	2014
Tax on net (profit)/loss at the mining statutory tax rate	**(37)**	148	49
Non-allowable deductions			
Impairment of assets	**(8)**	(63)	(43)
Finance costs	**(3)**	(3)	(3)
Share-based payments	**(6)**	(6)	(8)
Other	**(3)**	(15)	(14)
Difference between effective mining tax rate and statutory mining rate on mining income	**8**	3	5
Difference between non-mining tax rate and statutory mining rate on non-mining income	**1**	-	-
Effect on temporary differences due to changes in effective tax rates[1]	**(15)**	(21)	11
Prior year adjustment	**1**	2	5
Capital allowance and other rate differences[2]	**33**	45	50
Derecognition of deferred tax asset[3]	**-**	(5)	-
Deferred tax asset not recognised[4]	**(14)**	(23)	(25)
Income and mining taxation	**(43)**	62	27
Effective income and mining tax rate (%)	**40**	(14)	(19)

[1] This relates to the increase in the deferred tax rates related to Harmony Gold Mining Company Limited (Harmony) (12.5% to 21.1%) and Freegold (16.7% to 20.0%) mainly due to higher estimated profitability. This was partially offset by a decrease in the deferred tax rate for Randfontein Estates Limited (Randfontein) (14.3% to 10.1%) mainly due to lower estimated profitability. In 2015, the decrease in the deferred tax rates related to Freegold (20.3% to 16.7%) and Randfontein (18.9% to 14.3%) mainly due to the lower estimated profitability. In 2014, the significant decreases in the deferred tax rates related to Harmony (26.4% to 13.4%) and Freegold (22.9% to 20.3%) mainly due to the lower estimated profitability.

[2] This relates to the additional capital allowance that may be deducted from taxable income from mining operations in South Africa. A significant portion relates to Avgold Limited (Avgold) which has a 0% effective tax rate.

[3] In 2015, the Australian deferred tax asset was derecognised as the recoverability was deemed unlikely following the revised life-of-mine for Hidden Valley.

[4] This relates primarily to Hidden Valley and the PNG exploration operations and represents tax losses and deductible temporary difference arising in the year for which future taxable profits are not considered probable.

11 TAXATION continued

DEFERRED TAX

The analysis of deferred tax assets and liabilities is as follows:

Figures in million	US dollar 2016	2015
Deferred tax assets	**(40)**	(70)
Deferred tax asset to be recovered after more than 12 months	**(34)**	(52)
Deferred tax asset to be recovered within 12 months	**(6)**	(18)
Deferred tax liabilities	**204**	227
Deferred tax liability to be recovered after more than 12 months	**191**	212
Deferred tax liability to be recovered within 12 months	**13**	15
Net deferred tax liability	**164**	157

Deferred tax liabilities and assets on the balance sheet at 30 June 2016 and 30 June 2015 relate to the following:

Figures in million	US dollar 2016	2016
Gross deferred tax liabilities	**204**	227
Amortisation and depreciation	**204**	227
Gross deferred tax assets	**(40)**	(70)
Unredeemed capital expenditure	**(15)**	(41)
Provisions, including non-current provisions	**(9)**	(10)
Tax losses	**(16)**	(19)
Net deferred tax liability	**164**	157

Movement in the net deferred tax liability recognised in the balance sheet is as follows:

Figures in million	US dollar 2016	2015
Balance at beginning of year	**157**	245
(Credit)/expense per income statement	**35**	(61)
Foreign currency translation	**(28)**	(27)
Balance at end of year	**164**	157

As at 30 June, the group had the following potential future tax deductions:

Figures in million	US dollar 2016	2015
Unredeemed capital expenditure available for utilisation against future mining taxable income[1]	**1 649**	1 891
Tax losses carried forward utilisable against mining taxable income[2]	**320**	339
Capital Gains Tax (CGT) losses available to be utilised against future CGT gains	**39**	47
As at 30 June, the group has not recognised the following deferred tax asset amounts relating to the above	**559**	595
The unrecognised temporary differences are:		
Unredeemed capital expenditure[3]	**1 510**	1 617
Tax losses[2]	**206**	202
CGT losses[4]	**39**	47

[1] Includes Avgold US$915.0 million (2015: US$1 004.2 million), Freegold US$2.9 million (2015: US$111.4 million), Randfontein US$132.9 million (2015: US$152.3 million) and Hidden Valley US$595.3 million (2015: US$613.5 million). These have an unlimited carry-forward period.
[2] Relates mainly to Hidden Valley and the PNG exploration operations. These have an unlimited carry-forward period.
[3] Relates to Avgold and Hidden Valley.
[4] The CGT losses relate to the gross CGT losses available to be utilised against future CGT gains.

11 TAXATION continued

DIVIDEND TAX (DT)

A withholding tax of 15% on dividends (excluding a return of capital) and other distributions to the beneficial owners of shares (shareholders) became effective on 1 April 2012. DT is withheld by the company declaring the dividend or the withholding agent, unless specifically exempt. Foreign residents could qualify for an exemption or a reduced DT rate in terms of their relevant tax treaty. The withholding tax is a tax on the shareholder and if applicable will be withheld by the company and will reduce the amount paid to the shareholder.

12 EARNINGS/(LOSS) PER SHARE

BASIC EARNINGS/(LOSS) PER SHARE

Basic earnings/(loss) per share is calculated by dividing the net income attributable to shareholders by the weighted number of ordinary shares in issue during the year.

	2016	2015	2014
Ordinary shares in issue ('000)	**437 299**	436 187	435 825
Adjustment for weighted number of ordinary shares in issue ('000)	**(624)**	(185)	(287)
Weighted number of ordinary shares in issue ('000)	**436 675**	436 002	435 538
Treasury shares ('000)	**(936)**	(1 578)	(2 326)
Basic weighted average number of ordinary shares in issue ('000)	**435 739**	434 424	433 212

	US dollar		
	2016	2015	2014
Total net earnings/(loss) attributable to shareholders (millions)	**66**	(374)	(118)
Total basic earnings/(loss) per share (cents)	**15**	(86)	(27)

DILUTED EARNINGS/(LOSS) PER SHARE

For diluted earnings/(loss) per share, the weighted average number of ordinary shares in issue is adjusted to assume conversion of all potential dilutive ordinary shares as a result of share options granted to employees under the share option schemes in issue. A calculation is performed to determine the number of shares that could have been acquired at fair value, determined as the average annual market share price of the company's shares, based on the monetary value of the subscription rights attached to the outstanding share options. The number of shares calculated as above is compared with the number of shares that would have been issued assuming the exercise of the share options.

	2016	2015	2014
Weighted average number of ordinary shares in issue ('000)	**435 739**	434 424	433 212
Potential ordinary shares ('000)	**10 659**	3 667	1 503
Weighted average number of ordinary shares for diluted earnings per share ('000)	**446 398**	438 091	434 715

	US dollar		
	2016	2015	2014
Total diluted earnings/(loss) per share (cents)	**15**	(86)	(27)

The inclusion of share options issued to employees, as potential ordinary shares, has a dilutive effect on the earnings/(loss) per share. The issue price and the exercise price include the fair value of any service to be supplied to the entity in the future under the share option or other share-based payment arrangement.

DIVIDENDS

ACCOUNTING POLICY

Dividends declared are recognised in the period in which they are approved by the board of directors. Dividends are payable in South African rand.

Cash flows from dividends paid are classified under financing activities in the cash flow statement.

No dividend was declared during the years ended 30 June 2014, 30 June 2015 and 30 June 2016.

Refer to note 34(c) for the dividend declared after the reporting date.

13 PROPERTY, PLANT AND EQUIPMENT

	US dollar	
Figures in million	**2016**	2015
Mining assets (a)	**1 541**	1 862
Mining assets under construction (b)	**107**	104
Undeveloped properties (c)	**371**	445
Other non-mining assets (d)	**14**	19
Total property, plant and equipment	**2 033**	2 430

(a) Mining assets

ACCOUNTING POLICY

Mining assets, including mine development costs and mine plant facilities are initially recorded at cost, whereafter they are measured at cost less accumulated depreciation and impairment. Costs include expenditure that is directly attributable to the acquisition of the items. Subsequent costs are included in the asset's carrying amount or recognised as a separate asset, as appropriate, only when it is probable that future economic benefits associated with the item will flow to the group and the cost of the item can be measured reliably.

The net assets of operations placed on care and maintenance are impaired to their recoverable amount. Expenditure on the care and maintenance of these operations is charged against income, as incurred. Mineral and surface use rights represent mineral and surface use rights for parcels of land both owned and not owned by the group. Mineral and surface rights include acquired mineral use rights in production, development and exploration phase properties. The amount capitalised related to a mineral and surface right represents its fair value at the time it was acquired, either as an individual asset purchase or as part of a business combination, and is recorded at cost of acquisition.

The group's mineral use rights are enforceable regardless of whether proved or probable reserves have been established. In certain limited situations, the nature of use changes from an exploration right to a mining right upon the establishment of proved and probable reserves. The group has the ability and intent to renew mineral use rights where the existing term is not sufficient to recover all identified and valued proved and probable reserves and/or undeveloped mineral interests.

Depreciation
Depreciation of mining assets is computed principally by the units-of-production method over life-of-mine based on estimated quantities of economically recoverable proved and probable reserves, which can be recovered in future from known mineral deposits.

In most instances, proved and probable reserves provide the best indication of the useful life of the group's mines (and related assets). However, in some instances, proved and probable reserves may not provide a realistic indication of the useful life of the mine (and related assets). This may be the case, for example, where management is confident that further inferred resources will be converted into measured and indicated resources and if they are economically recoverable, they can also be classified as proved and probable reserves. Management is approaching economic decisions affecting the mine on this basis, but has chosen to delay the work required to designate them formally as reserves.

In assessing which resources to include so as to best reflect the useful life of the mine, management considers resources that have been included in the life-of-mine plan. To be included in the life-of-mine plan, resources need to be above the cut-off grade set by management, which means that the resource can be economically mined and is therefore commercially viable. This consistent systematic method for inclusion in the life-of-mine plan takes management's view of the gold price, exchange rates as well as cost inflation into account. In declaring the resource, management would have had to obtain a specified level of confidence of the existence of the resource through drilling as required by the South African Code for Reporting Exploration Results, Mineral Resources and Mineral Reserves (SAMREC).

Additional confidence in the existence, commercial viability and economical recovery of such resources may be based on historical experience and available geological information, such as geological information obtained from other operations that are contiguous to the group's as well as where the group mines continuations of these other operations' orebodies and reefs. This is in addition to the drilling results obtained by the group and management's knowledge of the geological setting of the surrounding areas, which would enable simulations and extrapolations to be done with a reasonable degree of accuracy.

In instances where management is able to demonstrate the economic recovery of such resources with a high level of confidence, such additional resources, which may also include certain, but not all, of the inferred resources, as well as the associated future development costs of accessing those resources, are included in the calculation of depreciation. The future development costs are those costs that need to be incurred to access these inferred resources, for example the costs to complete a decline or level, which may include infrastructure and equipping costs. These amounts have been extracted from the cash flow projections for the life-of-mine plans.

Mineral rights associated with production phase mineral interests are amortised over the life of mine using the units-of-production method in order to match the amortisation with the expected underlying future cash flows.

Impairment
Testing for impairment is done in terms of the group policy as discussed in note 2.5.

Stripping activities
The removal of overburden and other mine waste materials is often necessary during the initial development of a mine site, in order to access the mineral ore deposit. The directly attributable cost of this activity is capitalised in full within mining assets under construction, until the point at which the mine is considered to be capable of commercial production.

The removal of waste material after the point at which a mine is capable of commercial production is referred to as production stripping.

When the waste removal activity improves access to ore extracted in the current period, the costs of production stripping are charged to the income statement as operating costs in accordance with the principles of IAS 2 *Inventories.*

13 PROPERTY, PLANT AND EQUIPMENT continued

(a) Mining assets continued

ACCOUNTING POLICY continued

Stripping activities continued
Where production stripping activity both produces inventory and improves access to ore in future periods the associated costs of waste removal are allocated between the two elements. The portion which benefits future ore extraction is capitalised within stripping and development capital expenditure. If the amount to be capitalised cannot be specifically identified it is determined based on the volume of waste extracted compared with expected volume for the identified component of the orebody. Components are specific volumes of a mine's orebody that are determined by reference to the life-of-mine plan.

In certain instances significant levels of waste removal may occur during the production phase with little or no associated production. The cost of this waste removal is capitalised in full.

All amounts capitalised in respect of waste removal are depreciated using the units-of-production method based on proved and probable ore reserves of the component of the orebody to which they relate.

The effects of changes to the life-of-mine plan on the expected cost of waste removal or remaining reserves for a component are accounted for prospectively as a change in estimate.

Scrapping of assets
Where significant adverse changes have taken place relating to the useful life of an asset, that asset is tested for impairment in terms of the group policy as discussed in note 2.5. Whether or not an impairment is recognised, it is then necessary to review the useful lives and residual values of the assets within the CGU – this is reviewed at least annually. Where necessary, the useful lives and residual values of the individual assets are revised.

Where the useful life of an asset is nil as a result of no future economic benefit expected from the use or disposal of that asset, it is necessary to derecognise the asset. The loss arising from the derecognition is included in profit or loss in the period in which the asset was derecognised.

CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS – GOLD MINERAL RESERVES AND RESOURCES

Gold mineral reserves and resources are estimates of the amount of ounces that can be economically and legally extracted from the group's properties. In order to calculate the gold mineral reserves and resources, estimates and assumptions are required about a range of geological, technical and economic factors, including quantities, grades, production techniques, recovery rates, production costs, commodity prices and exchange rates.

Estimating the quantities and/or grade of the reserves and resources requires the size, shape and depth of the orebodies to be determined by analysing geological data such as the logging and assaying of drill samples. This process may require complex and difficult geological judgements and calculations to interpret the data.

Because the economic assumptions used to estimate the gold mineral reserves and resources change from year to year, and because additional geological data is generated during the course of operations, estimates of the mineral reserves and resources may change from year to year. Changes in the reserves and resources may affect the group's financial results and financial position in a number of ways, including:

- Asset carrying values may be affected due to changes in estimated cash flows;
- Scrapping of assets to be recorded in the income statement, following the derecognition of assets as no future economic benefit expected;
- Depreciation and amortisation charged in the income statement may change as they are calculated on the units-of-production method;
- Environmental provisions may change as the timing and/or cost of these activities may be affected by the change in mineral reserves; and
- Useful life and residual values may be affected by the change in mineral reserves.

At the end of each financial year, the estimate of proved and probable gold mineral reserves and resources is updated. Depreciation of mining assets is prospectively adjusted, based on these changes.

SENSITIVITY ANALYSIS - GOLD MINERAL RESERVES AND RESOURCES EFFECT ON DEPRECIATION

The group includes certain inferred resources in the denominator and future development costs in the numerator when performing the depreciation calculation for certain of its operations, where proved and probable reserves alone do not provide a realistic indication of the useful life of mine (and related assets). During the periods presented, this related to the Doornkop South Reef and Masimong shafts. Had the group only used proved and probable reserves in its calculations, depreciation for 2016 would have amounted to US$153.4 million (2015: US$226.4 million) (2014: US$217.6 million), compared with the reported totals of US$149.9 million (2015: US$215.8 million) (2014: US$207.0 million).

CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS – PRODUCTION START DATE

Various relevant criteria are considered in order to assess when the mine is substantially complete and ready for its intended use and moves into the production phase. Some of the criteria would include but are not limited to the following:

- The level of capital expenditure compared to the total project cost estimates;
- The ability to produce gold in a saleable form (where more than an insignificant amount of gold has been produced); and
- The ability to sustain the ongoing production of gold.

13 PROPERTY, PLANT AND EQUIPMENT continued

(a) Mining assets continued

CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS – IMPAIRMENT OF ASSETS

The recoverable amount of mining assets is generally determined utilising real discounted future cash flows.

Management also considers such factors as the quality of the individual orebody, market risk, asset specific risks and country risk in determining the fair value.

Key assumptions for the calculations of the mining assets' recoverable amounts are the commodity prices, resource values, marketable discount rates, costs to sell, exchange rates and the annual life-of-mine plans. In determining the commodity prices and resource values to be used, management assesses the long-term views of several reputable institutions on commodity prices and based on this, derives the commodity prices and resource values. The life-of-mine plans are based on the proved and probable reserves as included in the Reserve Declaration, which are determined in terms of SAMREC and The Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves (JORC), as well as resources where management has high confidence in the orebody and economical recovery of gold, based on historic and similar geological experience.

The group calculated the recoverable amounts (generally fair value less costs to sell) based on updated life-of-mine plans and the following gold price, silver price and exchange rates assumptions:

	2016	2015			2014
		Short term Year 1	Medium term Year 2	Long term Year 3+	
US$ gold price per ounce	**1 189**	1 150	1 180	1 200	1 300
US$ silver price per ounce	**17.80**	14.00	14.50	17.00	21.00
Exchange rate (R/US$)	**13.86**	12.17	11.86	11.66	10.17
Exchange rate (PGK/US$)	**3.10**	2.75	2.75	2.75	2.27
Rand gold price (R/kg)	**530 000**	450 000	450 000	450 000	425 000

For 2015, the short-, medium- and long-term assumptions were in response to the sharp decline in the gold and silver prices after the financial year end. The post-tax real discount rate for Hidden Valley was 11.77% (2015: 12.03%) (2014: 9.33%) and the post-tax real discount rates for the South African operations ranged between 8.43% and 11.48% (2015: 7.99% and 11.38%) (2014: 7.03% and 11.56%), depending on the asset, were used to determine the recoverable amounts (generally fair value less costs to sell). Cash flows used in the impairment calculations are based on life-of-mine plans which exceed five years for the majority of the mines. Refer to note 5 for details of impairments and reversals of impairments recorded. The following is the attributable gold resource value assumptions:

	South Africa			**Hidden Valley**		
US dollar per ounce	**2016**	2015	2014	**2016**	2015	2014
Measured	**40.86**	40.86	45.40	**n/a**	n/a	n/a
Indicated	**23.35**	23.35	25.94	**5.84**	15.00	76.79
Inferred	**5.84**	5.84	6.49	**5.84**	6.00	25.00

Should management's estimate of the future not reflect actual events, further impairments may be identified.
Factors affecting the estimates include:
- Changes to proved and probable ore reserves;
- Economical recovery of resources;
- The grade of the ore reserves may vary significantly from time to time;
- Review of strategy;
- Unforeseen operational issues at the mines;
- Differences between actual commodity prices and commodity price assumptions;
- Changes in the discount rate and foreign exchange rates; and
- Changes in capital, operating mining, processing and reclamation costs.

SENSITIVITY ANALYSIS - IMPAIRMENT OF ASSETS

One of the most significant assumptions that influence the life-of-mine plans and therefore impairments is the expected commodity prices. The sensitivity scenario of a 10% decrease in the commodity prices used in the discounted cash flow models and the resource values would have resulted in an additional impairment at Masimong of US$19.0 million and Hidden Valley of US$21.6 million. The decreases noted would have resulted in impairments at Unisel of US$10.9 million, Free State Surface of US$9.5 million, other Harmony assets of US$3.1 million and Doornkop of US$1.0 million (as opposed to the reversal of US$50.1 million). This analysis assumes that all other variables remain constant.

If the commodity prices used in the discounted cash flow models increased by 10%, impairments previously recorded at the following operations would reverse: Doornkop US$13.6 million, Phakisa US$21.8 million and Hidden Valley US$11.4 million. The increase would also have resulted in no impairment being recorded on Masimong.

13 PROPERTY, PLANT AND EQUIPMENT continued

(a) Mining assets continued

The movement in the mining assets balance is as follows:

	US dollar	
Figures in million	**2016**	2015
Cost		
Balance at beginning of year	**3 731**	4 181
Elimination of fully depreciated and impaired assets no longer in use	**(69)**	(55)
Additions	**133**	207
Disposals	**(2)**	(4)
Scrapping of assets	**(9)**	(83)
Adjustment to rehabilitation asset	**(7)**	3
Transfers and other movements	**21**	9
Translation	**(609)**	(527)
Balance at end of year	**3 189**	3 731
Accumulated depreciation and impairments		
Balance at beginning of year	**1 869**	1 686
Elimination of fully depreciated and impaired assets no longer in use	**(69)**	(55)
Impairment of assets	**47**	285
Reversal of impairment of assets	**(50)**	-
Disposals	**(2)**	(3)
Scrapping of assets	**(5)**	(41)
Depreciation	**147**	215
Transfers and other movements	**-**	(1)
Translation	**(289)**	(217)
Balance at end of year	**1 648**	1 869
Net carrying value	**1 541**	1 862

Scrapping of assets

During the 2016 financial year, the abandonment of unprofitable areas in the life-of-mine plans resulted in the derecognition of property, plant and equipment as no future economic benefits are expected from their use or disposal. Included in the total for 2016 are losses for Unisel amounting to US$1.1 million, Joel of US$1.8 million and US$ 0.7 million for Free State Surface.

In 2015, the Harmony management embarked on a life-of-mine optimisation process for the South African operations which was finalised in December 2014. The optimisation led to the abandonment of levels and areas with a carrying value at Masimong and Kusasalethu. Losses of US$18.5 million on Kusasalethu and US$18.7 million on Masimong were recorded. At 30 June 2015, following the annual life-of-mine planning, additional amounts of US$1.7 million and US$1.1 million were recorded for Kusasalethu and Masimong respectively. A loss of US$1.9 million was also recorded for Tshepong. All of the losses were as a result of the abandonment of uneconomical areas in the plans.

Stripping activities

Included in the balance for mining assets is an amount of US$1.6 million (2015: US$2.5 million) for stripping activities. Depreciation of US$0.9 million (2015: US$24.8 million) and an impairment of US$2.4 million (2015: US$32.3 million), related to Hidden Valley, were recorded for these activities.

(b) Mining assets under construction

ACCOUNTING POLICY

At the group's surface mines, when it has been determined that a mineral property can be economically developed as a result of establishing proved and probable reserves, costs incurred to develop the property are capitalised as incurred until the mine is considered to have moved into the production phase. These costs include costs to further delineate the orebody and remove overburden to initially expose the orebody. At the group's underground mines, all costs incurred to develop the property, including costs to access specific ore blocks or other areas of the underground mine, are capitalised to the extent that such costs will provide future economic benefits. These costs include the cost of shaft sinking and access, the costs of building access ways, lateral development, drift development, ramps, box cuts and other infrastructure development.

Borrowing costs are capitalised to the extent that they are directly attributable to the acquisition and construction of qualifying assets. Qualifying assets are assets that take a substantial time to get ready for their intended use. These costs are capitalised until the asset moves into the production phase. Other borrowing costs are expensed.

Where a depreciable asset is used in the construction or extension of a mine, the depreciation is capitalised against the mine's cost.

Exploration properties acquired are recognised in the balance sheet within development cost and are shown at cost less provisions for impairment determined in accordance with the group's accounting policy on impairment of non-financial assets.

Mineral interests associated with development and exploration phase mineral interests are not amortised until such time as the underlying property is converted to the production stage.

Capitalisation of pre-production costs ceases when commercial levels of production are reached. Commercial levels of production are discussed under "production start date" above.

13 PROPERTY, PLANT AND EQUIPMENT continued

(b) Mining assets under construction continued

The movement in the mining assets under construction balance is as follows:

Figures in million	US dollar 2016	2015
Cost		
Balance at beginning of year	**104**	97
Additions	**36**	30
Finance costs capitalised[1]	**5**	2
Transfers and other movements	**(21)**	(11)
Translation	**(17)**	(14)
Balance at end of year	**107**	104

[1]The average capitalisation rate applied was 10.5% (2015: 3.4%).

(c) Undeveloped properties

ACCOUNTING POLICY

Undeveloped properties are initially valued at the fair value of resources obtained through acquisitions. The carrying values of these properties are annually tested for impairment. Once development commences, these properties are transferred to mining properties and accounted for in accordance with the related accounting policy.

The movement in the undeveloped properties balance is as follows:

Figures in million	US dollar 2016	2015
Cost		
Balance at beginning of year	**446**	512
Translation	**(74)**	(66)
Balance at end of year	**372**	446
Accumulated impairments		
Balance at beginning of year	**1**	1
Balance at end of year	**1**	1
Net carrying value	**371**	445

(d) Other non-mining assets

ACCOUNTING POLICY

Land is shown at cost and not depreciated. Other non-mining fixed assets are shown at cost less accumulated depreciation and accumulated impairment losses.

Other non-mining fixed assets are depreciated on a straight-line basis over their estimated useful lives as follows:
- Vehicles at 20% per year.
- Computer equipment at 33.3% per year.
- Furniture and equipment at 16.67% per year.

The assets' residual values and useful lives are reviewed, and adjusted if appropriate, at each balance sheet date.

13 PROPERTY, PLANT AND EQUIPMENT continued

(d) Other non-mining assets continued

The movement in the other non-mining assets balance is as follows:

	US dollar	
Figures in million	**2016**	2015
Cost		
Balance at beginning of year	**34**	45
Elimination of fully depreciated and impaired assets no longer in use	**(1)**	(20)
Additions	**1**	11
Transfers and other movements	**-**	2
Translation	**(5)**	(4)
Balance at end of year	**29**	34
Accumulated depreciation and impairments		
Balance at beginning of year	**15**	32
Elimination of fully depreciated and impaired assets no longer in use	**(1)**	(20)
Depreciation	**3**	3
Transfers and other movements	**-**	1
Translation	**(2)**	(1)
Balance at end of year	**15**	15
Net carrying value	**14**	19

14 INTANGIBLE ASSETS

ACCOUNTING POLICY

Intangible assets consist of all identifiable non-monetary assets without physical substance. They are stated at cost less accumulated amortisation and accumulated impairment losses, if any. The following are the main categories of intangible assets:

Goodwill

Goodwill is an intangible asset with an indefinite useful life which is not amortised but tested for impairment on an annual basis, or when there is an indication of impairment. The excess of consideration transferred over the amount of any non-controlling interest in the acquiree and the acquisition-date fair value of any previous equity interest in the acquiree over the fair value of the group's share of the identifiable net assets acquired is recorded as goodwill. Goodwill on acquisition of subsidiaries, joint ventures and businesses is included in intangible assets. Goodwill on acquisition of associates is included in investments in associates and tested for impairment as part of the overall balance.

Goodwill is tested annually for impairment and carried at cost less accumulated impairment losses. Goodwill is allocated to cash-generating units for the purpose of impairment testing. The allocation is made to those cash-generating units or groups of cash-generating units that are expected to benefit from the business combination in which the goodwill arose. If the composition of one or more cash-generating units to which goodwill has been allocated changes due to a re-organisation, the goodwill is re-allocated to the units affected.

The gain or loss on disposal of an entity includes the carrying amount of goodwill relating to the entity sold.

Technology-based assets

Acquired computer software licences that require further internal development are capitalised on the basis of costs incurred to acquire and bring to use the specific software. These technology-based assets are classified as intangible assets with a finite useful life. These assets are amortised on a straight-line basis over their estimated useful lives, which are reviewed annually, as follows:

- Computer software at 20% per year.

CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS - IMPAIRMENT OF GOODWILL

Due to the wasting nature of mining assets and the finite life of a mine's reserves, the allocation of goodwill to a shaft will eventually result in an impairment charge for the goodwill. The group tests annually whether separately identifiable goodwill has suffered any impairment in accordance with the accounting policy stated in note 2.5. These calculations use estimates as per note 13.

	US dollar	
Figures in million	**2016**	2015
Goodwill (a)	**57**	70
Technology-based assets (b)	**2**	3
Total intangible assets	**59**	73

14 INTANGIBLE ASSETS continued

(a) Goodwill

Figures in million	US dollar 2016	2015
Cost		
Balance at beginning of year	**195**	224
Translation	**(34)**	(29)
Balance at end of year	**161**	195
Accumulated amortisation and impairments		
Balance at beginning of year	**125**	144
Translation	**(21)**	(19)
Balance at end of year	**104**	125
Net carrying value	**57**	70
The net carrying value of goodwill has been allocated to the following cash-generating units:		
Bambanani	**15**	19
Tshepong	**39**	48
Joel	**3**	3
Net carrying value	**57**	70

(b) Technology-based assets

Figures in million	US dollar 2016	2015
Cost		
Balance at beginning of year	**16**	17
Additions	**-**	1
Translation	**(3)**	(2)
Balance at end of year	**13**	16
Accumulated amortisation		
Balance at beginning of year	**13**	13
Amortisation charge for the year	**1**	1
Translation	**(3)**	(1)
Balance at end of year	**11**	13
Net carrying value	**2**	3

Technology-based assets includes computer software and intellectual property which has been acquired and developed for the group. These assets are amortised over five years.

ACCOUNTING POLICY - FINANCIAL ASSETS (APPLICABLE TO NOTES 15, 16, 17 AND 18)

Financial assets are initially measured at fair value when the group becomes a party to their contractual arrangements, with the exception of loans and receivables which are recognised on origination date. Transaction costs are included in the initial measurement of financial instruments, with the exception of financial instruments classified as at fair value through profit or loss. The subsequent measurement of financial assets is discussed below.

A financial asset is derecognised when the right to receive cash flows from the asset has expired or the group has transferred its rights to receive cash and either (a) has transferred substantially all the risks and rewards of the asset, or (b) has neither transferred nor retained substantially all the risks and rewards of the asset, but has transferred control of the assets.

On derecognition of a financial asset, the difference between the carrying amount and the sum of the consideration received and any cumulative gain or loss recognised in equity is recognised in profit or loss.

Financial assets and liabilities are offset and the net amount reported in the balance sheet when there is a legally enforceable right to offset the recognised amounts and there is an intention to settle on a net basis, or realise the asset and settle the liability simultaneously.

The group classifies financials assets as follows:

- **Held-to-maturity** investments are non-derivative financial assets with fixed or determinable payments and fixed maturities that the group's management has the positive intention and ability to hold to maturity. The group's held-to-maturity investments are subsequently measured at amortised cost using the effective interest method. The group assesses at the end of each reporting period whether there is objective evidence that a held-to-maturity investment is impaired as a result of an event.

  A portion of restricted investments held by the environmental trust funds (refer to note 16) are classified as held-to-maturity investments.

ACCOUNTING POLICY - FINANCIAL ASSETS (APPLICABLE TO NOTES 15, 16, 17 AND 18) continued

- **Loans and receivables** are non-derivative financial assets with fixed or determinable payments that are not quoted in an active market. They arise when the group provides money, goods or services directly to a debtor with no intention of trading the receivable. Loans and receivables are subsequently measured at amortised cost using the effective interest method. Loans and receivables include trade and other receivables (excluding VAT and prepayments), restricted cash and cash and cash equivalents.

  - **Cash and cash equivalents** are defined as cash on hand, deposits held at call with banks and short-term highly liquid investments with original maturities of three months or less. Cash and cash equivalents exclude restricted cash.

  - **Trade and other receivables** are recognised initially at fair value and subsequently measured at amortised cost using the effective interest method, less provision for impairment. A provision for impairment of receivables is established when there is objective evidence that the group will not be able to collect all amounts due according to the original terms of receivables. The amount of the provision is the difference between the asset's carrying amount and the present value of estimated future cash flows, discounted at the effective interest rate. The carrying amount of the asset is reduced through the use of a provision for impairment (allowance account) and the amount of the loss is recognised in the income statement. When a trade receivable is uncollectible, it is written off against the allowance account for trade receivables. Subsequent recoveries of amounts previously written off are credited in the income statement.

- **Available-for-sale financial assets** are non-derivatives that are either designated in this category or not classified in any of the other categories. They are included in non-current assets unless the investment matures or management intends to dispose of the investment within 12 months of the balance sheet date.

  Available-for-sale financial assets are subsequently carried at fair value. The fair values of quoted investments are based on current bid prices. If the fair value for a financial instrument cannot be obtained from an active market, the group establishes fair value by using valuation techniques.

  The group assesses at each balance sheet date whether there is objective evidence that a financial asset or a group of financial assets is impaired. In the case of equity securities classified as available for sale, a significant or prolonged decline in the fair value of the security below its cost is considered in determining whether the securities are impaired. If considered impaired, the cumulative loss is removed from other reserves and recognised in the income statement. Subsequent increases in the fair value are recognised in equity as impairment losses recognised in the income statement are not reversed through the income statement.

- **Financial assets at fair value through profit or loss** have two sub-categories: financial assets held-for-trading, and those designated at fair value through profit or loss at inception. Derivative assets are categorised as held for trading unless designated as hedges. These assets are subsequently measured at fair value with gains or losses arising from changes in fair value recognised in the income statement in the period in which they arise.

15 RESTRICTED CASH

	US dollar	
Figures in million	**2016**	2015
Non-current	**4**	4
Environmental guarantees (a)	**4**	4
Current	**1**	1
Environmental rehabilitation (b)	**1**	1
Total restricted cash	**5**	5

(a) The amount relates to funds set aside to serve as collateral against guarantees made to the Department of Mineral Resources (DMR) in South Africa for environmental and rehabilitation obligations. Refer to note 24. A portion of the funds are held on call account and the remaining amounts are invested in money market funds.

(b) The amount relates to monies released from the environmental trusts as approved by the DMR. These funds may only be used for further rehabilitation.

16 RESTRICTED INVESTMENTS

	US dollar	
Figures in million	**2016**	2015
Investments held by environmental trust funds (a)	**167**	192
Investments held by social trust funds (b)	**3**	4
Total restricted investments	**170**	196

(a) Environmental trust funds

ACCOUNTING POLICY

Contributions are made to the group's environmental trust funds, created in accordance with statutory requirements, to fund the estimated cost of pollution control, rehabilitation and mine closure at the end of the life of the group's mines. The trusts are consolidated into the group as the group exercises control of the trusts. The measurement of the investments held by the trust funds is dependent on their classification under financial assets. Income received and gains are treated in accordance with these classifications.

16 RESTRICTED INVESTMENTS continued

(a) Environmental trust funds continued

The environmental trust funds are irrevocable trusts under the group's control. Contributions to the trusts are invested in interest-bearing short-term and medium-term cash investments and medium term equity-linked notes issued by commercial banks that provide guaranteed interest and additional interest or growth linked to the growth of the Shareholder Weighted Top 40 (SWIX 40) or the Top 40 index of the JSE. The equity-linked notes are designated as fair value through profit or loss investments and recorded at fair value whilst the interest-bearing short-term investments are classified either as held-to-maturity and recorded at amortised cost or as cash and cash equivalents and recorded at fair value. These investments provide for the estimated cost of rehabilitation at the end of the life of the group's mines. Income earned on the investments is retained in the funds and reinvested.

The environmental trust funds consist of:

	US dollar	
Figures in million	**2016**	2015
Held-to-maturity financial assets	**126**	113
Cash and cash equivalents (loans and receivables)	**-**	39
Fair value through profit or loss financial assets	**41**	40
Total environmental trust funds	**167**	192

Reconciliation of the movement in the investments held by environmental trust funds:

	US dollar	
Figures in million	**2016**	2015
Balance at beginning of year	**192**	213
Interest income	**9**	11
Fair value gain	**1**	1
Withdrawal of funds	**(2)**	(4)
Equity-linked deposits matured/(acquired)	**6**	(22)
Acquisition of held-to-maturity investments	**27**	18
Net transfer of cash and cash equivalents	**(33)**	4
Translation	**(33)**	(29)
Balance at end of year	**167**	192

(b) The social trust fund

The social trust fund is an irrevocable trust under the group's control. The purpose of the trust is to fund the social plan to reduce the negative effects of restructuring on the group's workforce, to put measures in place to ensure that the technical and life skills of the group's workforce are developed and to develop the group's workforce in such a manner as to avoid or minimise the effect of job losses and a decline in employment through turnaround or redeployment strategies.

The social trust fund investment comprises a unit trust portfolio that is exposed to the fair value changes in the equity market and is classified as a fair value through profit or loss investment.

Reconciliation of the movement in the investments held by the social trust fund:

	US dollar	
Figures in million	**2016**	2015
Balance at beginning of year	**4**	4
Translation	**(1)**	-
Balance at end of year	**3**	4

17 DERIVATIVE FINANCIAL ASSETS

	US dollar	
Figures in million	**2016**	2015
Derivative financial assets		
Foreign exchange hedging contracts	**25**	-
Total derivative financial assets	**25**	-

During February 2016, Harmony entered into foreign exchange hedging contracts (forex hedging contracts) in the form of zero cost collars, which establish a minimum (purchased put options) and maximum (sold call options) rand/US dollar exchange rate at which to convert US dollars to rands. The nominal value of open forex hedging contracts at 30 June 2016 was US$500 million. Refer to note 6 for further details.

The forex hedging contracts are classified as held-for-trading and the fair value is based upon market valuations. The mark-to-market remeasurement of the forex hedging contracts is derived from a Black-Scholes valuation technique, derived from spot rand/US$ exchange rate inputs, implied volatilities on the rand/US$ exchange rate, rand/US$ inter-bank interest rates and discounted at market interest rate (zero-coupon interest rate curve).

The derivative financial instruments are subject to enforceable master netting arrangements, as the group and the counterparty have both elected to settle the forex hedging contracts on a net basis.

18 TRADE AND OTHER RECEIVABLES

	US dollar	
Figures in million	**2016**	2015
Current assets		
Financial assets		
Trade receivables (gold)	**11**	35
Other trade receivables	**8**	10
Provision for impairment	**(2)**	(5)
Trade receivables - net	**17**	40
Interest and other receivables (a)	**4**	4
Loan to associate (net) (b)(i)	**4**	-
Employee receivables	**1**	1
Non-financial assets		
Prepayments	**2**	5
Value added tax	**16**	12
Total current trade and other receivables	**44**	62
Non-current assets		
Financial assets		
Loans to associates (b)	**8**	17
Loan to ARM BBEE Trust (c)	**14**	-
Provision for impairment (b) (c)	**(10)**	(10)
Total non-current trade and other receivables	**12**	7

(a) No impairment allowance is necessary in respect of any balances included in interest and other receivables as all amounts are classified as fully performing.

(b) (i) During 2015, Rand Refinery drew down on the facility provided by its shareholders. Harmony's portion of the shareholder's loan was US$10 million. As the loan is considered to be part of the net investment in associate, Harmony's share of Rand Refinery's losses of US$1.2 million was recorded against the loan. An additional provision of US$1.6 million (2015: US$1.2 million) was provided for. The loan is due during December 2016. Refer to note 19 for more details.

(ii) The balance in 2016 comprises US$7.9 million (2015: US$9.5 million) owed by Pamodzi Gold Limited (Pamodzi). Pamodzi was placed into liquidation during 2009 and the loan was provided in full. Harmony is a concurrent creditor in the Pamodzi Orkney liquidation.

(c) During 2016, Harmony advanced US$13.5 million to the ARM BBEE Trust, a shareholder of African Rainbow Minerals Limited (ARM). The trust is controlled and consolidated by ARM, who holds 14.6% of Harmony's shares. Harmony is a trustee of the ARM BBEE Trust. The loan is subordinated and unsecured. The interest is market related (3 month JIBAR plus 4.25%) and is receivable on the maturity of the loan on 31 December 2022. At year end, the loan was tested for impairment following the decrease in the ARM share price since advancing the loan to the ARM BBEE Trust and an amount of US$2.2 million was provided for. The recoverable amount was calculated using a discounted cash flow model. The cash flows in the model includes projected interest payments and projected ARM share price on the expected repayment date.

18 TRADE AND OTHER RECEIVABLES continued

The movement in the provision for impairment of current trade and other receivables during the year was as follows:

Figures in million	US dollar 2016	2015
Balance at beginning of year	**5**	6
Impairment loss recognised	**1**	-
Reversal of impairment loss	**(2)**	-
Translation	**(2)**	(1)
Balance at end of year	**2**	5

The movement in the provision of loans receivable during the year was as follows:

Figures in million	US dollar 2016	2015
Balance at beginning of year	**10**	11
Impairment loss recognised	**4**	1
Translation	**(1)**	(2)
Total provision of loans receivable	**13**	10
Total provision of non-current loans receivable	**10**	10
Total provision of current loans receivable	**3**	-

The ageing of current trade receivables at the reporting date was:

Figures in million	US dollar Gross	Impairment
30 June 2016		
Fully performing	**15**	**-**
Past due by 1 to 30 days	**-**	**-**
Past due by 31 to 60 days	**-**	**-**
Past due by 61 to 90 days	**1**	**-**
Past due by more than 90 days	**1**	**-**
Past due by more than 361 days	**2**	**2**
	19	**2**
30 June 2015		
Fully performing	38	-
Past due by 1 to 30 days	1	-
Past due by 31 to 60 days	-	-
Past due by 61 to 90 days	-	-
Past due by more than 90 days	1	1
Past due by more than 361 days	5	4
	45	5

The ageing of loans receivable at the reporting date was:

Figures in million	US dollar Gross	Impairment
30 June 2016		
Fully performing	**21**	**5**
Past due by 1 to 30 days	**-**	**-**
Past due by 31 to 60 days	**-**	**-**
Past due by 61 to 90 days	**-**	**-**
Past due by more than 361 days	**8**	**8**
	29	**13**
30 June 2015		
Fully performing	7	1
Past due by 1 to 30 days	-	-
Past due by 31 to 60 days	-	-
Past due by 61 to 90 days	-	-
Past due by more than 361 days	10	9
	17	10

18 TRADE AND OTHER RECEIVABLES continued

Based on past experience, the group believes that no impairment allowance is necessary in respect of fully performing receivables as the amount relates to customers that have a good track record with the group. The majority of fully performing trade receivables are indirectly associated with financial institutions of good credit quality. Provisions for the other loans and receivables have been raised following an assessment of their credit risk by management.

During the 2015 and 2016 years there was no renegotiation of the terms of any receivable.

As at 30 June 2016 and 30 June 2015, there was no collateral pledged or held for any of the receivables.

19 INVESTMENTS IN ASSOCIATES

CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS

The investments in associates are evaluated annually for impairment by comparing the entire carrying value of the investment (which includes loans to associates that form part of the net investment in associates) to the recoverable amount, which is the higher of value in use or fair value less costs to sell. Discounted cash flow models are used to calculate the net present value of the investments. The cash flows in the models include expected interest and capital payments on loans, dividends and proceeds on disposal.

(a) Harmony acquired a 32.4% interest in Pamodzi on 27 February 2008, initially valued at US$46.5 million. Pamodzi was listed on the JSE and had interests in operating gold mines in South Africa. Pamodzi was placed in liquidation in March 2009 and the trading of its shares on the JSE was suspended. As at 30 June 2016, the liquidation process has not been concluded. No financial information subsequent to 31 March 2009 is available and therefore no information has been disclosed.

(b) Rand Refinery provides precious metal smelting and refining services in South Africa. Harmony holds a 10.38% share in Rand Refinery. Although the group holds less than 20% of the equity shares of Rand Refinery, the group is able to exercise significant influence by virtue of having a right to appoint a director on the board. Through the 10% shareholding and the right to appoint a director on the board, the investment has been accounted for as an associate.

The investment was written down to Rnil during the 2014 financial year following a discrepancy between the actual inventory and the accounting records being noted due to issues experienced following the implementation of a new Enterprise Resource Planning (ERP) system on 1 April 2013.

As a precautionary measure following these challenges Rand Refinery's shareholders extended Rand Refinery an irrevocable, subordinated loan facility of up to US$114.2 million. Harmony's maximum commitment in terms of this facility is US$13.3 million. The agreements relating to the facility were signed on 23 July 2014. In December 2014, Rand Refinery drew down US$88.1 million on the shareholders' loan. Harmony's portion of the shareholders' loan was US$10.4 million. Interest on the facility is JIBAR plus a margin of 3.5%. The facility is convertible to equity after a period of two years. The loan, in substance, forms part of Harmony's net investment in Rand Refinery.

During the 2016 financial year, interest received on the loan amounted to US$0.8 million (2015: US$0.5 million). For the 2016 year, Harmony recognised its share of profits from associate of US$0.5 million (2015: losses of US$2.1 million) against the loan. An additional provision for impairment of US$1.6 million (2015: US$1.2 million) was also recorded. This impairment is included in "Other expenses (net)" in the income statement. The recoverable amount of the loan at 30 June 2016 is US$4.2 million (2015: US$6.6 million).

The fair value measurement of the net investment is classified as level 3 and is non-recurring. The loan is due in December 2016 and has been included in Other receivables - current.

Harmony has equity accounted for its share of the profits and losses based on Rand Refinery's most recent available management accounts.

The movement in the loan to associate during the year is as follows:

	US dollar	
Figures in million	**2016**	2015
Balance at beginning of year	**7**	-
Drawn down	**-**	10
Interest accrued	**1**	1
Interest received	**-**	(1)
Share of profit/(loss)	**-**	(2)
Impairment	**(2)**	(1)
Translation	**(2)**	-
Balance at end of year	**4**	7

NOTES TO THE GROUP FINANCIAL STATEMENTS continued

for the years ended 30 June 2016

19 INVESTMENTS IN ASSOCIATES continued

The results of Rand Refinery, and its aggregated assets (including goodwill) and liabilities, are as follows at the reporting date:

	US dollar	
Figures in million	**2016**	2015
Non-current assets	**50**	44
Current assets	**21**	31
Other current assets (excluding cash and cash equivalents)	**12**	24
Cash and cash equivalents	**9**	7
Total assets	**71**	75
Non-current liabilities[1]	**1**	88
Current liabilities[2]	**99**	23
Total liabilities	**100**	111
Revenue	**37**	54
Total comprehensive loss	**(19)**	(33)
Percentage interest held	**10.38%**	10.38%

[1] Includes the sub-ordinated loans from shareholders, which are convertible into equity on maturity, in 2015.
[2] Includes the sub-ordinated loans from shareholders, which are convertible into equity on maturity, in 2016.

Rand Refinery's year end is 31 August (2015: 30 September).

20 INVESTMENT IN JOINT OPERATIONS

MOROBE MINING JOINT VENTURES (MMJV) PARTNERSHIP AGREEMENT

The group has a 50% interest in mining and exploration assets located in the Morobe province, PNG. Newcrest Mining Limited (Newcrest) owns the remaining 50% interest in these assets. The assets include the Hidden Valley mine and the Wafi-Golpu projects. This partnership was formed during the 2009 financial year through a range of transactions, which included Newcrest's purchase of a 30.01% participating interest and a further farm-in of an additional 19.99% participating interest in the assets. The total value of the transaction was estimated at US$530 million and was completed by 30 June 2009. The joint arrangement is accounted for as a joint operation. Refer to note 34(d) for transactions after the reporting date.

21 INVENTORIES

ACCOUNTING POLICY

Inventories, which include bullion on hand, gold-in-process, gold in lock-up, ore stockpiles and consumables, are measured at the lower of cost and net realisable value. Net realisable value is assessed at each reporting date and is determined with reference to relevant market prices.

The cost of bullion, gold-in process and gold in lock-up is determined by reference to production cost, including amortisation and depreciation at the relevant stage of production. Ore stockpiles are valued at average production cost. Stockpiles and gold in lock-up are classified as non-current assets where the stockpile exceeds current processing capacity and where a portion of static gold in lock-up is expected to be recovered more than 12 months after balance sheet date.

Gold in-process inventories represent materials that are currently in the process of being converted to a saleable product. In-process material is measured based on assays of the material fed to process and the projected recoveries at the respective plants. In-process inventories are valued at the average cost of the material fed to process attributable to the source material coming from the mine or stockpile plus the in-process conversion costs, including the applicable depreciation relating to the process facility, incurred to that point in the process. Gold in-process includes gold in lock-up which is generally measured from the plants onwards. Gold in lock-up is expected to be extracted when plants are demolished at the end of their useful lives, which is largely dependent on the estimated useful life of the operations feeding the plants. Where mechanised mining is used in underground operations, in-progress material is accounted for at the earliest stage of production when reliable estimates of quantities and costs are capable of being made. At the group's open pit operations, gold in-process represents production in broken ore form.

Consumables are valued at weighted average cost value after appropriate allowances for slow moving and redundant items.

	US dollar	
Figures in million	**2016**	2015
Gold in lock-up	**3**	3
Gold in-process, ore stockpiles and bullion on hand	**36**	50
Consumables at weighted average cost (net of provision)	**43**	56
Total inventories	**82**	109
Non-current portion of gold in lock-up and gold in-process	**(3)**	(3)
Total current portion of inventories	**79**	106
Included in the balance above is:		
Inventory valued at net realisable value	**19**	44

21 INVENTORIES continued

During the 2016 financial year, an increase of US$0.1 million (2015: a write-down of US$1.2 million) was made for the net realisable value adjustment for gold in lock-up.

During the year, an increase of US$6.2 million (2015: US$4.7 million) to the provision for slow moving and redundant stock was made. The increase in 2016 and 2015 in the provision was primarily the result of additional redundant stock items identified in PNG and provided for. The total provision at 30 June 2016 was US$14.5 million (2015: US$10.0 million).

22 SHARE CAPITAL

ACCOUNTING POLICY

Ordinary shares are classified as equity, incremental costs directly attributable to the issue of new shares or options are shown in equity as a deduction, net of tax, from the proceeds.

The cost of treasury shares is eliminated against the share capital balance.

Authorised

1 200 000 000 (2015: 1 200 000 000) ordinary shares of 50 SA cents each.

Issued

437 299 479 (2015: 436 187 133) ordinary shares of 50 SA cents each. All issued shares are fully paid.

Share issues

Shares issued in the 2015 and 2016 financial years relate to the exercise of share options by employees. During March 2016, 35 000 shares were issued to the Tlhakanelo Employee Share Trust, the vehicle used for the employee share ownership plan (ESOP). Note 31 and 32 set out details in respect of the share option scheme.

Treasury shares

Included in the total of treasury shares is an amount of 335 shares held by Lydenburg Exploration Limited, a wholly owned subsidiary of the company.

During August 2012, 3.5 million shares were issued to the Tlhakanelo Employee Share Trust. As the trust is controlled by the group, the shares are treated as treasury shares. During March 2016, an additional 35 000 shares were issued to the Tlhakanelo Employee Share Trust for purposes of settling the 2014 and 2015 offers of ESOP share appreciation rights that vested during the current year. During 2016, 537 757 (2015: 670 859) shares were exercised by employees and the remaining 524 915 shares are still held as treasury shares.

23 OTHER RESERVES

	US dollar	
Figures in million	**2016**	2015
Foreign exchange translation reserve (a)	**(1 753)**	(1 378)
Equity component of convertible bond (b)	**41**	41
Acquisition of non-controlling interest in subsidiary (c)	**(57)**	(57)
Share-based payments (d)	**197**	175
Repurchase of equity interest (e)	**(13)**	(13)
Other (f)	**(6)**	(6)
Total other reserves	**(1 591)**	(1 238)

(a) The balance of the foreign exchange translation reserve movement represents the cumulative translation effect of the group's off-shore operations. It also includes the translation effect from rand to US dollar.

	US dollar	
Figures in million	**2016**	2015
Balance at beginning of year	**(1 378)**	(1 010)
Current year's foreign exchange translation gain/(loss)	**(375)**	(368)
Balance at end of year	**(1 753)**	(1 378)

(b) On 24 May 2004, the group issued a convertible bond. The amount representing the value of the equity conversion component is included in other reserves, net of deferred income taxes. The equity conversion component is determined on the issue of the bonds and is not changed in subsequent periods. The convertible bonds were repaid in 2009.

23 OTHER RESERVES continued

(c) On 15 March 2004, Harmony announced that it had made an off-market cash offer to acquire all the ordinary shares, listed and unlisted options of Abelle Limited, held by non-controlling interests. The excess of the purchase price of US$86.5 million over the carrying amount of non-controlling interest acquired, amounting to US$57 million, has been accounted for under other reserves.

(d) Share-based payments

	US dollar	
Figures in million	**2016**	2015
Balance at beginning of year	**175**	159
Share-based payments expensed (i)	**22**	16
Balance at end of year	**197**	175

(i) The group issues equity-settled instruments to certain qualifying employees under an employee share option scheme and employee share ownership plan (ESOP) to purchase shares in the company's authorised but unissued ordinary shares. Equity share-based payments are measured at the fair value of the equity instruments at the date of the grant. Share-based payments are expensed over the vesting period, based on the group's estimate of the shares that are expected to eventually vest. During the 2016 financial year, the equity-settled share-based payment expense of US$22.1 million (2015: US$16.4 million) was charged to the income statement (refer to note 31 for more details).

The 2014 and 2015 offers of ESOP share appreciation rights that vested during the 2016 financial year were settled through the issue of ordinary shares to the Tlhakanelo Employee Share Trust. This was due to the positive share price appreciation since grant date, and therefore resulted in the treatment of these awards as equity-settled.

(e) On 19 March 2010, Harmony Gold Mining Company Limited concluded an agreement with African Vanguard Resources (Proprietary) Limited (AVRD), for the purchase of its 26% share of the mining titles of the Doornkop South Reef. The original sale of the 26% share in the mining titles was accounted for as an in-substance call option by AVRD over the 26% mineral right. The agreement to purchase AVRD's 26% interest during the 2010 financial year is therefore considered to be a repurchase of the option (equity interest). The 26% interest was transferred from AVRD to Harmony in exchange for Harmony repaying the AVRD Nedbank loan and the issue of 2 162 359 Harmony shares. The difference between the value of the shares issued of US$20.5 million, the liability to the AVRD and transaction costs, have been taken directly to equity.

(f) Included in the 2016 financial year is an actuarial gain of US$0.3 million (2015: US$0.4 million), net of tax of US$0.1 million (2015: US$0.2 million), on post-retirement benefits recognised in other comprehensive income (refer to note 25 for more details). The cumulative actuarial loss (net of tax) is US$2.2 million at 30 June 2016 (2015: US$2.5 million).

ACCOUNTING POLICY - PROVISIONS (APPLICABLE TO NOTES 24, 25 AND 26)

Provisions are recognised when the group has a present legal or constructive obligation as a result of past events where it is probable that an outflow of resources embodying economic benefits will be required to settle the obligation, and a reliable estimate of the amount of the obligation can be made.

The amount recognised as a provision is the net present value of the best estimate of the expenditure required to settle the present obligation at balance sheet date using a pre-tax rate that reflects current market assessment of the time value of money and the risks specific to the obligation. The estimate takes into account the associated risks and uncertainties. The increase in the provision due to the passage of time is recognised as interest expense.

Provisions are reviewed at each balance sheet date and adjusted to reflect the current best estimate. If it is no longer probable that an outflow of economic benefits will be required, the provision is reversed.

24 PROVISION FOR ENVIRONMENTAL REHABILITATION

ACCOUNTING POLICY

Estimated long-term environmental obligations, comprising pollution control, rehabilitation and mine closure, are based on the group's environmental management plans in compliance with current technological, environmental and regulatory requirements.

Based on disturbances to date, the net present value of expected rehabilitation cost estimates is recognised and provided for in full in the financial statements. The estimates are reviewed annually and are discounted using a pre-tax risk-free rate that is adjusted to reflect the current market assessments of the time value of money and the risks specific to the obligation.

Annual changes in the provision consist of finance costs relating to the change in the present value of the provision and inflationary increases in the provision estimate, as well as changes in estimates. The present value of environmental disturbances created are capitalised to mining assets against an increase in the rehabilitation provision. If a decrease in the liability exceeds the carrying amount of the asset, the excess is recognised immediately in the income statement. If the asset value is increased and there is an indication that the revised carrying value is not recoverable, impairment is performed in accordance with the accounting policy dealing with impairments of non-financial assets. Rehabilitation projects undertaken, included in the estimates are charged to the provision as incurred. The cost of ongoing current programmes to prevent and control pollution is charged against income as incurred. Over time, the liability is increased to reflect an interest element, and the capitalised cost is depreciated over the life of the related asset.

24 PROVISION FOR ENVIRONMENTAL REHABILITATION continued

CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS

Significant judgement is applied in estimating ultimate rehabilitation cost that will be required in future to rehabilitate the group's mines. Ultimate cost may significantly differ from current estimates.

For the South African operations, management used an inflation rate of 6.75% (2015: 6.50%) (2014:6.50%) and the expected life of the mines according to the life-of-mine plans in the calculation of the estimated net present value of the rehabilitation liability. The discount rates used for the calculation are dependent on the operation's life of mine and are as follows: up to 12 months – 8.00% (2015: 6.50%) (2014: 6.75%); for one to five years – 8.40% (2015: 7.30%) (2014: 7.75%); for six to nine years – 9.00% (2015: 7.80%) (2014: 8.00%) and for ten years or more – 9.20% (2015: 8.00%) (2014: 8.25%). These estimates were based on recent yields determined on government bonds. In calculating the rehabilitation liability in PNG for 2016, an inflation rate of 5.0% (2015: 5.0%) (2014: 2.9%) was used, together with a discount rate of 6.25% (2015: 6.25%) (2014: 6.25%).

The group's mining and exploration activities are subject to extensive environmental laws and regulations. The group has made, and expects to make in the future, expenditures to comply with such laws and regulations, but cannot predict the full amount of such future expenditures. Estimated future reclamation costs are based principally on legal and regulatory requirements.

The following is a reconciliation of the total liability for environmental rehabilitation:

	US dollar	
Figures in million	**2016**	2015
Provision raised for future rehabilitation		
Balance at beginning of year	**182**	198
Change in estimate - Balance sheet	**(7)**	3
Change in estimate - Income statement[1]	**(7)**	(6)
Time value of money and inflation component of rehabilitation costs	**11**	13
Translation	**(31)**	(26)
Total provision for environmental rehabilitation	**148**	182

[1] The change in estimate includes rehabilitation work performed during the year. Refer to note 5(c).

The provision for environmental rehabilitation for PNG amounts to US$34.7 million (2015: US$36.4 million) and is unfunded.

While the ultimate amount of rehabilitation costs to be incurred in the future is uncertain, the group has estimated that, based on current environmental and regulatory requirements, the total undiscounted cost for the mines, in the current monetary terms, is approximately US$203.7 million (2015: US$237.3 million).

	US dollar	
Figures in million	**2016**	2015
Future net undiscounted obligation		
Ultimate estimated rehabilitation cost	**204**	237
Amounts invested in environmental trust funds (refer to note 16)	**(167)**	(192)
Total future net undiscounted obligation	**37**	45

The group intends to finance the ultimate rehabilitation costs from the money invested in environmental trust funds as well as the proceeds on sale of assets and gold from plant clean-up at the time of mine closure. The group has guarantees in place, some cash-backed, relating to some of the environmental liabilities. Refer to notes 15 and 33.

During 2015 and 2016, the group rehabilitated certain decommissioned operations in the Free State as part of its overall strategy of eliminating safety and health exposures and reducing the environmental rehabilitation liability. Following several years of working closely with the DMR to determine the best solution for rehabilitating certain pits, Kalgold received a decision from the DMR during 2015 to use tailings to backfill pits that have been mined out and as a result the deposition into these pits is in progress.

25 RETIREMENT BENEFIT OBLIGATION

ACCOUNTING POLICY

The group provides medical cover to current employees and certain retirees through certain funds. The medical accounting costs for the defined benefit plan are assessed using the projected unit credit method. The health care obligation is measured at the present value of the estimated future cash outflows using government bond interest rates consistent with the terms and risks of the obligation. Actuarial gains and losses as a result of these valuations are recognised in other comprehensive income (OCI) at revaluation date. Actuarial gains and losses recognised in OCI will not be recycled to profit or loss. The future liability for current and retired employees and their dependants is accrued in full based on actuarial valuations obtained annually.

CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS

An updated actuarial valuation is carried out at the end of each financial year. Assumptions used to determine the liability include a discount rate of 9.7%, no increases in employer subsidies (in terms of the agreement) and mortality rates according to the SA 1956/62 mortality table (SA “”a mf”” tables) (retirement age of 60 years) and a medical inflation rate of 7.7% (2015: discount rate of 9%, retirement age of 60 years and 7% medical inflation rate). Management determined the discount rate by assessing government bonds with similar terms to the liability. The changes to the discount rate and medical inflation rate are similar to changes in interest and inflation rates in South Africa.

25 RETIREMENT BENEFIT OBLIGATION continued

(a) Pension and provident funds

The group contributes to several pension and provident funds governed by the Pension Funds Act, 1956 for the employees of its South African subsidiaries. The pension funds are multi-employer defined contribution industry plans. The group's liability is therefore limited to its monthly determined contributions. The provident funds are funded on a "monetary accumulative basis" with the member's and employer's contributions having been fixed in the constitution of the funds.

The Australian group companies make contributions to each employee's superannuation (pension) funds in accordance with the Superannuation Guarantee Scheme (SGS). The SGS is a Federal Government initiative enforced by law which compels employers to make regular payments to regulated funds providing for each employee on their retirement. The SGS were set at a minimum of 9.5% of gross salary and wages for the 2016 year (2015: 9.5%). The fund is a defined contribution plan.

The PNG Superannuation Act 2002 requires a compulsory employer contribution of 8.4% (2015: 8.4%) into an approved superannuation (pension) fund if an employee is appointed for a period of three months or more. The approved superannuation funds are defined contribution plans.

Substantially all the group's employees are covered by the above mentioned retirement benefit plans. Funds contributed by the group for the 2016 financial year amounted to US$34.3 million (2015: US$43.0 million).

(b) Post-retirement benefits other than pensions

Harmony inherited a post-retirement medical benefit obligation, which existed at the time of the Freegold acquisition in 2002. The group's obligation in this regard is to pay a subsidy of 2% for every completed year of employment up to a maximum of 50% of total medical aid contributions, commencing on date of retirement. Should the employee die, either in service or after retirement, this benefit will transfer to his/her dependants. The medical aid tariffs are based on the Bestmed medical scheme (Bestmed) options. Except for the aforementioned employees, Harmony has no other post-retirement obligation for the other group employees.

The liability is unfunded and will be settled out of cash and cash equivalents when it becomes due. The liability is based on an actuarial valuation conducted during the year ended 30 June 2016, using the projected unit credit method. The next actuarial valuation will be performed on 30 June 2017.

The principal actuarial assumptions used to determine the present value of unfunded obligations are discussed above. In addition the following was also considered:

- It is assumed that all Continuation and Widow Members (CAWMs) will remain on the current benefit option and income band. For employed members, post-employment contributions were assumed to be equal to the average payable for the current CAWMs membership;
- It is assumed that not all employed members will remain employed until retirement therefore estimated resignation and ill-health retirement rates are also taken into account;
- It is assumed that 90% of employed members will be married at retirement or earlier death and that wives are four years younger than their husbands. It is assumed that the only dependants will be spouses.

Through the post-employment medical plan, the group is exposed to a number of risks, the most significant of which are discussed below:

- **Change in bond yields:** A decrease in the bond yields will increase the plan liability.
- **Inflation risk:** The obligation is linked to inflation and higher inflation will lead to a higher liability.
- **Life expectancy:** The obligation is to provide benefits for the life of the member, so increases in life expectancy will result in an increase in the plan's liabilities.

The net actuarial gain for 2016 was mainly due to exits of current employees being higher than expected, partially offset by exits of CAWMS being lower than expected and the actual subsidy inflation being higher than assumed (2015: net actuarial gain was mainly as a result of exits of current employees being higher than expected).

	US dollar	
Figures in million	**2016**	2015
Present value of unfunded obligations	**11**	13
Current employees	**4**	5
Retired employees	**7**	8
Movement in the liability recognised in the balance sheet		
Balance at beginning of year	**13**	23
Contributions paid	**(1)**	(1)
Curtailments[1]	**-**	(8)
Finance cost	**1**	1
Net actuarial gain recognised during the year[2]	**-**	(1)
Translation	**(2)**	(1)
Balance at end of year	**11**	13

[1] The curtailment in 2015 relates to the significant reduction in members qualifying for the post-retirement benefit, mainly arising from the change in the terms of employment of members, resulting in a reduction of the liability of US$8.2 million.
[2] The net actuarial gain has been recorded in other comprehensive income.

25 RETIREMENT BENEFIT OBLIGATION continued

(b) Post-retirement benefits other than pensions continued

Figures in million	US dollar 2016	2015
The net liability of the defined benefit plan is as follows:		
Present value of defined benefit obligation	**11**	13
Net liability of defined benefit plan	**11**	13

The effect of a percentage point increase and decrease in the assumed medical cost trend rate is as follows:

Figures in million	US dollar 2016	2015
Effect of a 1% increase on:		
Defined benefit obligation	**1**	2
Effect of a 1% decrease on:		
Defined benefit obligation	**1**	2

The above sensitivity analyses are based on a change in an assumption while holding all other assumptions constant. In practice, this is unlikely to occur, and changes in some of the assumptions may be correlated. The analysis is performed on the same basis for 2015.

The group expects to contribute approximately US$0.5 million to the benefit plan in 2017.

The weighted average duration of the defined benefit obligation is 15.5 years.

ACCOUNTING POLICY - FINANCIAL LIABILITIES (APPLICABLE TO NOTES 26, 27 AND 28)

Financial liabilities are initially measured at fair value when the group becomes a party to their contractual arrangements. Transaction costs are included in the initial measurement of financial liabilities, with the exception of financial liabilities classified at fair value through profit or loss. The subsequent measurement of financial liabilities is discussed below. A financial liability is derecognised when the obligation under the liability is discharged, cancelled or expires. The group classifies financial liabilities as follows:

- **Borrowings** are initially recognised at fair value net of transaction costs incurred and subsequently measured at amortised cost, comprising original debt less principal payments and amortisation, using the effective yield method. Any difference between proceeds (net of transaction cost) and the redemption value is recognised in the income statement over the period of the borrowing using the effective interest rate method.

  Fees paid on the establishment of the loan facilities are capitalised as a pre-payment and amortised over the period of the facility to which it relates, to the extent it is probable that some or all of the facility will be drawn down. To the extent there is no evidence that it is probable that some or all of the facility will be drawn down, the fee is expensed.

  Borrowings are classified as current liabilities unless the group has an unconditional right to defer settlement of the liability for at least 12 months after the balance sheet date.

- **Trade and other payables** are recognised initially at fair value and subsequently measured at amortised cost using the effective interest method. Payables are classified as current liabilities if payment is due within a year or less. If not, they are presented as non-current liabilities.

26 OTHER NON-CURRENT LIABILITIES

ACCOUNTING POLICY

Refer to the accounting policy on provisions above, accounting policies on financial liabilities below and note 31 for the accounting policy on share-based payments.

Figures in million	US dollar 2016	2015
Financial liabilities		
Sibanye Beatrix ground swap royalty provision (a)	**1**	2
Non-financial liabilities		
ESOP share-based payment liability (b)	**-**	1
Total other non-current liabilities	**1**	3

26 OTHER NON-CURRENT LIABILITIES continued

(a) During 2014, Harmony and Sibanye entered into an agreement whereby the Joel mine exchanged two portions of its mining right for two portions of Sibanye's Beatrix mine's mining right, as well as acquiring two additional portions from Beatrix (sale portions). The transaction was completed in May 2014. The purchase consideration of the sale portions acquired by Joel is payable as a royalty of 3% on gold revenue generated from these two portions. The royalty liability recorded is the net present value of 3% of future gold revenue of the sale portions. During 2016, an amount of US$0.2 million (2015: US$0.2 million) was recorded relating to time value of money and US$0.4 million (2015: US$0.3 million) relating to changes in estimates. An amount of US$0.4 million (2015: US$0.2 million) has been reclassified as current and recorded in other payables. Refer to note 13(a) for further details on the key assumptions for the calculation of the provision, which is based on the life-of-mine plan of Joel.

(b) The liability in 2015 relates to the cash-settled share-based payment transaction following the award of ESOP share appreciation rights (SARs) to qualifying employees through the Tlhakanelo Employee Share Trust. As all outstanding awards vest in March 2017, the remaining liability is recorded in Trade and other payables. Refer to note 31 for more details.

27 BORROWINGS

Nedbank Limited

On 20 December 2013, the company entered into a loan facility with Nedbank Limited, comprising a revolving credit facility of R1 300 million (US$125.6 million). In January 2015, R400 million (US$34.9 million) was drawn down. On 7 July 2015 an additional R300 million (US$24.1 million) was drawn down while on 26 November 2015 R400 million (US$28.2 million) was repaid.

Interest accrues on a day-to-day basis over the term of the loan at a variable interest rate.

Refer to note 34(a) for transactions after the reporting date.

US dollar revolving credit facilities

On 11 August 2011, the company entered into a loan facility which was jointly arranged by Nedbank Limited and FirstRand Bank Limited (acting through its Rand Merchant Bank division) (syndicate), comprising a US$300 million syndicated revolving credit facility, of which only US$270 million was drawn down. The facility was utilised to fund exploration projects in PNG. Interest at LIBOR plus 260 basis points was paid quarterly. The syndicated revolving facility was settled in February 2015 by drawing against the new facility (discussed below).

On 22 December 2014, the company entered into a loan facility agreement which was jointly arranged by Nedbank Limited and Barclays Bank Plc, comprising a revolving credit facility of up to US$250 million. All conditions precedent were met during February 2015 and US$205 million was drawn down to repay the syndicated revolving credit facility, resulting in a net cash outflow of US$65 million. The remaining US$45 million was drawn down during May 2015.

During the 2016 financial year, the following repayments were made: 4 December 2015 - US$50 million; 8 February 2016 - US$20 million; 9 May 2016 - US$40 million.

Interest accrues on a day-to-day basis over the term of the loan at a variable interest rate.

Terms and debt repayment schedule at 30 June 2016

	Interest charge	Repayment terms	Repayment date	Security
Nedbank Limited (secured loan - rand revolving credit facility)	1, 3 or 6 month JIBAR plus 3.5%, payable at the elected interest interval	Repayable on maturity	23 December 2016	Cession and pledge of operating subsidiaries' shares
US dollar revolving credit facility (secured loan)	3 or 6 month LIBOR plus 3%, payable at the elected interest interval	Repayable on maturity	6 February 2018	Cession and pledge of operating subsidiaries' shares

Debt covenants

The debt covenant tests for both the rand and US dollar revolving credit facilities were renegotiated during December 2014 and are as follows:

- The group's interest cover ratio shall not be less than five (EBITDA[1]/Total interest paid);
- Tangible Net Worth[2] to total net debt ratio shall not be less than six times or eight times when dividends are paid;
- Leverage[3] shall not be more than 2.5 times.

[1] Earnings before interest, taxes, depreciation and amortisation (EBITDA) as defined in the agreement excludes unusual items such as impairment and restructuring cost.
[2] Tangible Net Worth is defined as total equity less intangible assets.
[3] Leverage is defined as total net debt to EBITDA.

The debt covenant tests are performed on a quarterly basis. No breaches of the covenants were identified during the tests in the 2015 and 2016 financial years.

27 BORROWINGS continued

Interest-bearing borrowings

	US dollar	
Figures in million	**2016**	2015
Non-current borrowings		
Nedbank Limited (secured loan - rand revolving credit facilities)	**-**	33
Balance at beginning of year	**33**	-
Draw down	**24**	35
Repayments	**(28)**	-
Transferred to current borrowings	**(20)**	-
Translation	**(9)**	(2)
Syndicated (secured loan - US$ revolving credit facility)	**-**	-
Balance at beginning of year	**-**	270
Repayments	**-**	(270)
US dollar revolving credit facility (secured loan)	**139**	247
Balance at beginning of year	**247**	-
Draw down	**-**	250
Repayments	**(110)**	-
Issue cost	**-**	(4)
Amortisation of issue costs	**2**	1
Total non-current borrowings	**139**	280
Current borrowings		
Nedbank Limited (secured loan - rand revolving credit facilities)	**20**	-
Balance at beginning of year	**-**	-
Transferred from non-current liabilities	**20**	-
Total current borrowings	**20**	-
Total interest-bearing borrowings	**159**	280
The maturity of borrowings is as follows:		
Current	**20**	-
Between one to two years	**139**	33
Between two to five years	**-**	247
	159	280
Undrawn committed borrowing facilities:		
Expiring within one year	**68**	-
Expiring after one year	**110**	74
	178	74

Interest rates

	Effective rate	
	2016 %	2015 %
Nedbank Limited - rand revolving credit facility	**10.4**	9.7
US dollar revolving credit facility	**3.5**	3.0

28 TRADE AND OTHER PAYABLES

ACCOUNTING POLICY

The group accrues for the cost of the leave days granted to employees during the period in which the leave days accumulate.

	US dollar	
Figures in million	**2016**	2015
Financial liabilities		
Trade payables	**24**	43
Other liabilities	**5**	5
Non-financial liabilities		
Payroll accruals	**26**	27
Leave liabilities (a)	**23**	26
Shaft related accruals	**24**	22
Other accruals	**8**	9
ESOP share-based payment liability (b)	**1**	1
Value added tax	**4**	4
Total trade and other payables	**115**	137

(a) Leave liabilities

Employee entitlements to annual leave are recognised on an ongoing basis. An accrual is made for the estimated liability for annual leave as a result of services rendered by employees up to the balance sheet date. The movement in the liability recognised in the balance sheet is as follows:

	US dollar	
Figures in million	**2016**	2015
Balance at beginning of year	**26**	31
Benefits paid	**(26)**	(33)
Total expense per income statement	**27**	32
Translation	**(4)**	(4)
Balance at end of year	**23**	26

(b) ESOP share-based payment liability

The liability relates to the cash-settled share-based payment transaction following the award of ESOP SARs to qualifying employees through the Tlhakanelo Employee Share Trust. Refer to note 31 for more details.

29 CASH GENERATED BY OPERATIONS

Figures in million	US dollar 2016	2015	2014
Reconciliation of profit/(loss) before taxation to cash generated by operations:			
Profit/(loss) before taxation	**109**	(436)	(145)
Adjustments for:			
Amortisation and depreciation	**149**	216	207
(Reversal of impairment)/impairment of assets	**(3)**	285	135
Share-based payments	**23**	18	26
Net decrease in provision for post-retirement benefits	**(1)**	(8)	(1)
Net decrease in provision for environmental rehabilitation	**(7)**	(6)	(4)
Profit on sale of property, plant and equipment	**-**	(1)	(3)
Loss on scrapping of property, plant and equipment	**4**	42	-
(Profit)/loss from associates	**-**	2	10
Profit on disposal of investments	**-**	-	(1)
Net gain on financial instruments	**(1)**	(1)	(16)
Interest received	**(16)**	(20)	(21)
Finance cost	**19**	22	27
Inventory adjustments	**7**	18	(9)
Non-cash net foreign exchange translation difference	**20**	34	16
Provision for bad debts	**4**	1	2
Exploration (amortisation and depreciation)	**-**	4	4
Other non-cash adjustments	**(3)**	2	1
Effect of changes in operating working capital items			
Receivables	**12**	10	18
Inventories	**5**	-	(4)
Payables	**1**	(14)	(24)
Cash generated by operations	**322**	168	218

ADDITIONAL CASH FLOW INFORMATION

(i) The income and mining taxes paid in the statement of cash flow represents actual cash paid less refunds received.

(ii) At 30 June 2016, US$177.9 million (2015: US$74.0 million) of borrowing facilities had not been drawn down and is therefore available for future operational activities and future capital commitments. Refer to note 27.

FOR THE FINANCIAL YEARS ENDED 30 JUNE 2015 AND 30 JUNE 2016

(a) Principal non-cash transactions

Share-based payments (refer to note 31).

FOR THE FINANCIAL YEAR ENDED 30 JUNE 2014

(a) Acquisitions and disposal of investments/businesses

(i) Profit on sale of property, plant and equipment

During May 2014, the ground swap between Joel mine and Sibanye's Beatrix mine was completed, resulting in a non-cash profit being recognised for the difference between the carrying value of the Joel portion and the fair value of the Beatrix portion.

(ii) Investments in financial assets

During 2014, a cash offer for Witwatersrand Consolidated Gold Resources Limited's (Wits Gold) entire share capital was made to all Wits Gold shareholders by Sibanye. Harmony accepted the offer and on 14 April 2014 a total consideration of US$4.9 million was received.

(b) Principal non-cash transactions

Share-based payments (refer to note 31).
Joel/Sibanye ground swap (refer to note 26).

30 EMPLOYEE BENEFITS

ACCOUNTING POLICY

- **Pension, provident and medical benefit plans** are funded through monthly contributions. The group pays fixed contributions into a separate entity in terms of the defined contribution pension, provident and medical plans which are charged to the income statement in the year to which they relate. The group's liability is limited to its monthly determined contributions and it has no further liability, legal or constructive, if the fund does not hold sufficient assets to pay all employees the benefits relating to employee service in the current and prior periods. Refer to note 25 for details of the post-retirement medical benefit plan.

- **Termination benefits** are payable when employment is terminated before the normal retirement date, or whenever an employee accepts voluntary redundancy in exchange for these benefits. The group recognises termination benefits at the earlier of the following dates: (a) when the group can no longer withdraw the offer of those benefits; and (b) when the entity recognises costs for a restructuring that is within the scope of IAS 37 and involves the payment of termination benefits. In the case of an offer made to encourage voluntary redundancy, the termination benefits are measured based on the number of employees expected to accept the offer. Benefits falling due more than 12 months after balance sheet date are discounted to present value.

	2016	2015
Number of permanent employees as at 30 June:		
South African operations	**25 861**	26 000
International operations[1]	**1 339**	1 465
Total number of permanent employees	**27 200**	27 465

	US dollar	
Figures in million	**2016**	2015
Aggregate earnings		
The aggregate earnings of employees including directors were:		
Salaries and wages and other benefits	**459**	592
Retirement benefit costs	**34**	43
Medical aid contributions	**13**	16
Total aggregated earnings[2]	**506**	651

[1]The total number of employees in Australia, including the Brisbane office, at 30 June 2016 was 72 (2015: 75). The total for the international operations includes the MMJV employees.
[2] These amounts have been included in cost of sales, corporate expenditure and capital expenditure.

Remuneration for directors and executive management is fully disclosed in note 32.

During the 2016 financial year US$6.5 million (2015: US$25.2 million) was included in the payroll costs for termination costs. Termination costs include the cost relating to the voluntary retrenchment and restructuring process as well as retrenchments due to shaft closures (refer to note 5).

31 SHARE-BASED PAYMENTS

ACCOUNTING POLICY

The group operates the following employee share incentive plans:
- Equity-settled share-based payments plan where the group grants share options to certain employees in exchange for services received;
- Equity-settled and cash-settled employee share ownership plan.

Equity-settled share-based payments are measured at fair value that includes market performance conditions but excludes the impact of any service and non-market performance conditions of the equity instruments at the date of the grant. The share-based payments are expensed over the vesting period, based on the group's estimate of the shares that are expected to eventually vest. The group used an appropriate option pricing model in determining the fair value of the options granted. Non-market vesting conditions are included in assumptions about the number of options that are expected to vest. At each balance sheet date, the estimates of the number of options that are expected to become exercisable are revised. The impact of the revision of original estimates, if any, is recognised in the income statement, with a corresponding adjustment to equity. The proceeds received net of any directly attributable transaction costs are credited to share capital (nominal value) and share premium when the options are exercised.

Cash-settled share-based payments are measured at fair value. The liability is remeasured at each balance sheet date until the date of settlement.

CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS

The fair value of options granted is being determined using either a binomial, Black-Scholes or a Monte Carlo valuation model. The significant inputs into the model are: vesting period, risk free interest rate, volatility, price on date of grant and dividend yield.

EMPLOYEE SHARE-BASED PAYMENTS

The group has the 2012 employee share ownership plan (ESOP) and the 2006 share plan that are active. The objective of these schemes is to recognise the contributions of employees to the group's financial position and performance and to retain key employees.

The total cost relating to employee share-based payments is made up as follows:

	US dollar	
Figures in million	**2016**	2015
2012 employee share ownership plan (a)	**2**	5
2006 share plan (b)	**21**	13
Total employee share-based payments included in cost of sales	**23**	18

The 2003 scheme expired during 2015 with the remaining 614 476 options with a weighted average price of R44.76 lapsing. There was no cost for the 2015 and 2016 years.

The directors are authorised to issue up to 60 011 669 ordinary shares to participants who have received awards in accordance with Harmony's employee share incentive schemes.

Subsequent to the annual general meeting held on 1 December 2010, 1 039 794 ordinary shares have been issued in terms of the 2003 scheme and 3 218 067 ordinary shares have been issued in terms of the 2006 share plan. 49 990 794 outstanding share option awards have been granted in terms of the 2006 share plan. The Tlhakanelo Employee Share Trust is authorised to allocate 12 864 000 ordinary shares to the employee share ownership plan.

(a) 2012 employee share ownership plan

During August 2012, Harmony issued the first awards under its ESOP. The ESOP is overseen by the Tlhakanelo Employee Share Trust. In terms of the ESOP rules, qualifying employees are offered one scheme share for every two share appreciation rights (SARs).

On the fifth anniversary of the first allocation date, any unallocated scheme shares and SARs will be distributed to all employees who participated in the ESOP and who are still employed with the company pro rata in accordance with the number of scheme shares previously allocated to the employees.

The scheme shares are accounted for as equity-settled.

The vesting of the SARs is linked to the positive share appreciation of Harmony’s share price from the grant of the award. The SARs incorporate a cash bonus with a minimum pay-out guarantee of R18 (applicable where there is no share appreciation or share appreciation less than R18) and a maximum pay-out ceiling of R32 per SAR over the vesting period. The SARs include an equity-settled portion as well as a cash-settled portion related to the cash bonus. The cash-settled portion has been recognised as a liability in the balance sheet (refer to note 26 and 28), the fair value of which is remeasured at each reporting date.

The total cost relating to the 2012 ESOP is made up as follows:

	US dollar	
Figures in million	**2016**	2015
2012 employee share ownership plan		
Equity-settled	**1**	3
Cash-settled	**1**	2
	2	5

31 SHARE-BASED PAYMENTS continued

EMPLOYEE SHARE-BASED PAYMENTS continued

(a) 2012 employee share ownership plan continued

Activity on awards

Activity on awards outstanding	Scheme shares Number of awards	SARs Number of awards	SARs Weighted average award price (SA rand)
For the year ended 30 June 2016			
Balance at beginning of year	**1 052 032**	**2 104 064**	**75.11**
Awards granted	**25 600**	**51 200**	**39.48**
Awards exercised	**(549 276)**	**(1 098 552)**	**75.42**
Awards forfeited	**(22 236)**	**(44 472)**	**68.36**
Balance at end of year	**506 120**	**1 012 240**	**73.26**
For the year ended 30 June 2015			
Balance at beginning of year	1 699 748	3 399 496	77.65
Awards granted	46 760	93 520	20.47
Awards exercised	(651 442)	(1 302 884)	77.95
Awards forfeited	(43 034)	(86 068)	73.06
Balance at end of year	1 052 032	2 104 064	75.11

List of awards granted but not yet vested (listed by grant date)	Number of awards	Award price (SA rand)	Remaining life (years)
As at 30 June 2016			
Scheme shares			
8 August 2012 allocation	**422 900**	**n/a**	**0.7**
8 March 2013 allocation	**19 800**	**n/a**	**0.7**
15 March 2014 allocation	**17 000**	**n/a**	**0.7**
15 March 2015 allocation	**21 140**	**n/a**	**0.7**
15 March 2016 allocation	**25 280**	**n/a**	**0.7**
	506 120		
Share appreciation rights			
8 August 2012 allocation	**845 800**	**80.03**	**0.7**
8 March 2013 allocation	**39 600**	**56.35**	**0.7**
15 March 2014 allocation	**34 000**	**40.32**	**0.7**
15 March 2015 allocation	**42 280**	**31.01**	**0.7**
15 March 2016 allocation	**50 560**	**39.48**	**0.7**
	1 012 240		
Total awards granted but not yet vested	**1 518 360**		

Figures in million	US dollar 2016	US dollar 2015
Gain realised by participants on awards traded during the year	**3**	4
Fair value of awards exercised during the year	**3**	4

31 SHARE-BASED PAYMENTS continued

EMPLOYEE SHARE-BASED PAYMENTS continued

(a) 2012 employee share ownership plan continued

Measurement

The fair value of equity instruments granted during the year was valued using the Cox-Ross-Rubinstein binomial tree on the equity-settled portion of the SARs. The minimum payout guarantee is valued at net present value and the spot share price on grant date was used for the scheme shares.

(i) Assumptions applied at grant date for awards granted during the year	Scheme shares	SARs
Price at date of grant (SA rand per share):		
15 March 2015 allocation	20.47	20.47
15 March 2016 allocation	39.48	39.48
Risk-free interest rate:		
15 March 2015 allocation	n/a	6.53%
15 March 2016 allocation	n/a	7.38%
Expected volatility: *		
15 March 2015 allocation	n/a	52.62%
15 March 2016 allocation	n/a	87.06%
Expected dividend yield:		
for all allocations	n/a	1%
Minimum payout guarantee (SA rand per SAR):		
for all allocations	n/a	18.00 to 32.00
Vesting period (from grant date):		
15 March 2015 allocation	2 years	2 years
15 March 2016 allocation	1 year	1 year

* The volatility is measured as an annualised standard deviation of historical share price returns, using an exponentially weighted moving average (EWMA) model, with a lambda of 0.99. The volatility is calculated on the grant date, and takes into account historical data matched to the term of the allocation.

	SA rand per award		
(ii) Fair values used as a basis to recognise share-based cost	Scheme shares	SARs	Minimum payout guarantee
15 March 2015 allocation	19.97	0.50	17.09
15 March 2016 allocation	38.98	0.50	16.72

(iii) Cash-settled liability

	US dollar	
Figures in million	**2016**	2015
Cash-settled liability		
Non-current	**-**	1
Current	**1**	1
Total cash-settled liability	**1**	2
Movement in the cash-settled liability recognised in the balance sheet:		
Balance at beginning of year	**2**	3
IFRS 2 share-based payment charge for the year	**1**	2
Awards paid	**(1)**	(2)
Translation	**(1)**	(1)
Balance at end of year	**1**	2

31 SHARE-BASED PAYMENTS continued

EMPLOYEE SHARE-BASED PAYMENTS continued

(b) Options granted under the 2006 share plan

The 2006 share plan consists of share appreciation rights (SARs), performance shares (PS) and restricted shares (RS). The share plan is equity-settled.

Award	Vesting	Performance criteria
SARs	SARs will vest in equal thirds in year three, four and five, subject to the performance conditions having been satisfied. The SARs will have an expiry date of six years from the grant date and the offer price equals the closing market prices of the underlying shares on the trading date immediately preceding the grant.	*2009 to 2013 allocation:* The group's headline earnings per share must have grown since the allocation date by more than the South African Consumer Price Index (CPI).
PS	The PS will vest after three years from the grant date, if and to the extent that the performance conditions have been satisfied.	*2015 allocation* • 50% of the number of the rights awarded are linked to the total shareholder return of the group on an absolute basis. • 50% of the number of the rights awarded are linked to the total shareholder return of the group as compared to that of the South African Gold Index. *2014 allocation* • the number of the rights awarded are linked to the group's performance in comparison to the South African Gold Index. *2012 to 2013 allocation* • 50% (senior management) or 70% (management) of the number of the rights awarded are linked to the annual gold production of the group in relation to the targets set annually. • 50% (senior management) or 30% (management) of the number of the rights awarded are linked to the group's performance in comparison to the South African Gold Index.
RS	The RS will vest after three years from grant date.	The participant is still employed within the group.

Termination of employees' participation in the share plan is based on "no fault" and "fault" definitions.

- Fault — All unvested and unexercised SARs and all PS and RS not yet vested are lapsed and cancelled.
- No fault — Accelerated vesting occurs and all unvested and unexercised share options are settled in accordance with the rules of the plan.

Activity on share options

	SARs		PS	RS
Activity on options and rights granted but not yet exercised	**Number of options and rights**	**Weighted average option price (SA rand)**	**Number of rights**	**Number of rights**
For the year ended 30 June 2016				
Balance at beginning of year	**16 419 967**	**38.86**	**14 322 508**	**673 102**
Options granted and accepted	**-**	**-**	**25 652 631**	**508 920**
Options accepted	**669 824**	**18.42**	**-**	**-**
Options exercised	**(432 650)**	**24.58**	**(803 301)**	**(272 482)**
Options forfeited and lapsed	**(2 500 359)**	**59.21**	**(4 193 800)**	**(53 566)**
Balance at end of year	**14 156 782**	**34.74**	**34 978 038**	**855 974**
For the year ended 30 June 2015				
Balance at beginning of year	12 222 725	54.85	9 123 758	629 056
Options granted and accepted	6 998 079	18.46	7 255 423	83 000
Options exercised	(137 276)	20.41	(336 931)	(29 350)
Options forfeited and lapsed	(2 663 561)	59.55	(1 719 742)	(9 604)
Balance at end of year	16 419 967	38.86	14 322 508	673 102

	SARs		PS		RS	
Options and rights vested but not exercised at year end	**2016**	2015	**2016**	2015	**2016**	2015
Options and rights vested but not exercised	**1 427 179**	1 884 175	**-**	-	**-**	-
Weighted average option price (SA rand)	**85.22**	82.29	**n/a**	n/a	**n/a**	n/a

31 SHARE-BASED PAYMENTS continued

EMPLOYEE SHARE-BASED PAYMENTS continued

(b) Options granted under the 2006 share plan continued

List of options and rights granted but not yet exercised (listed by allocation date)	Number of options and rights	Award price (SA rand)	Remaining life (years)
As at 30 June 2016			
Share appreciation rights			
15 November 2010	**576 377**	**84.81**	**0.4**
15 November 2011	**591 440**	**104.79**	**1.4**
16 November 2012	**1 369 526**	**68.84**	**2.4**
15 November 2013	**4 926 488**	**33.18**	**3.4**
17 November 2014	**6 692 951**	**18.41**	**4.4**
	14 156 782		
Performance shares			
15 November 2013	**4 617 529**	**n/a**	**0.4**
17 November 2014	**6 391 388**	**n/a**	**1.4**
16 November 2015	**23 457 121**	**n/a**	**2.4**
17 February 2016	**512 000**	**n/a**	**2.4**
	34 978 038		
Restricted shares [1]			
15 November 2010	**79 281**	**n/a**	**0.4**
15 November 2011	**64 000**	**n/a**	**1.4**
16 November 2012	**143 353**	**n/a**	**2.4**
15 November 2013	**79 281**	**n/a**	**0.4**
17 November 2014	**60 000**	**n/a**	**1.4**
16 November 2015	**430 059**	**n/a**	**2.4**
	855 974		
Total options and rights granted but not yet exercised	**49 990 794**		

[1] The 2010, 2011 and 2012 restricted shares vested in November 2013, November 2014 and November 2015 respectively. Restricted shares that were not exercised, partially or fully, at that time remain restricted for a further three years, but were supplemented by a matching grant of restricted shares. All restricted shares are then only settled after the end of a further three year period.

	US dollar	
Figures in million	**2016**	2015
Gain realised by participants on options and rights traded during the year	**2**	1
Fair value of options and rights exercised during the year	**3**	1

Measurement

The fair value of equity instruments granted during the year was valued using the Monte Carlo simulation on the market-linked PS, Cox-Ross-Rubinstein binomial tree on the SARs and spot share price on grant date for the RS.

(i) Assumptions applied at grant date for awards granted during the year	SARs	Performance shares	Restricted shares
Price at date of grant (SA rand per share):			
17 November 2014 allocation	17.95	n/a	17.95
28 October 2015 allocation[1]	n/a	n/a	10.85
16 November 2015 allocation	n/a	n/a	8.92
Risk-free interest rate:			
17 November 2014 allocation	7.21%	7.44%	n/a
16 November 2015 allocation	n/a	7.77%	n/a
17 February 2016 allocation	n/a	7.70%	n/a
Expected volatility: [2]			
17 November 2014 allocation	44.39%	53.81%	n/a
16 November 2015 allocation	n/a	71.53%	n/a
17 February 2016 allocation	n/a	71.53%	n/a
Expected dividend yield:			
17 November 2014 allocation	1.00%	0.00%	n/a
16 November 2015 allocation	n/a	0.00%	n/a
17 February 2016 allocation	n/a	0.00%	n/a
Vesting period (from grant date)			
for all allocations	5 years	3 years	3 years

[1] All awards for this allocation were exercised in the 2016 financial year.

[2] The volatility is measured as an annualised standard deviation of historical share price returns, using an exponentially weighted moving average (EWMA) model, with a lambda of 0.99. The volatility is calculated on the grant date, and takes into account the previous three years of historical data.

31 SHARE-BASED PAYMENTS continued

EMPLOYEE SHARE-BASED PAYMENTS continued

(b) Options granted under the 2006 share plan continued

Measurement continued

In all cases, valuation date is the same as allocation date, except for the 16 November 2015 and 17 November 2014 allocation of performance shares with a valuation date of 16 February 2016 and 2 June 2015 respectively.

	SA rand per award		
(ii) Fair values used as a basis to recognise share-based cost	**SARs**	**Performance shares**	**Restricted shares**
17 November 2014 allocation	7.86	11.19	17.95
28 October 2015 allocation	n/a	n/a	10.85
16 November 2015 allocation	n/a	36.96	8.92
17 February 2016 allocation	n/a	37.01	n/a

OTHER SHARE-BASED PAYMENTS

On 20 March 2013 Harmony signed transaction and funding agreements to give effect to an empowerment transaction to dispose of 30% of its Free State based Phoenix operation (Phoenix) to BEE shareholders, which includes a free-carry allocation of 5% to a community trust that has been created and is currently controlled by Harmony. The transaction closed on 25 June 2013, following the fulfilment of the last condition precedent. In terms of the agreements Phoenix was transferred to a newly incorporated subsidiary (PhoenixCo).

The awards to the BEE partners have been accounted for as in-substance options as the BEE partners will only share in the upside, and not the downside of their equity interest in PhoenixCo until the date the financing provided by Harmony is fully repaid. On this date the options will be exercised and a non-controlling interest in PhoenixCo will be recognised. The award of the options to the BEE partners is accounted for by the group as an equity-settled share-based payment arrangement. The in-substance options carry no vesting conditions and the fair value of the options of US$2.3 million was expensed on the grant date, 25 June 2013.

32 RELATED PARTIES

None of the directors of Harmony or, to the knowledge of Harmony, their families, had an interest, directly or indirectly, in any transaction from 1 July 2013 or in any proposed transaction that has affected or will materially affect Harmony or its subsidiaries, other than as stated below.

Key management personnel are those persons having authority and responsibility for planning, directing and controlling the activities of the group, directly or indirectly, including any director (whether executive or otherwise) of the group.

During 2016, the executive directors received remuneration of US$3.4 million, comprising of US$1.2 million for salaries, US$0.1 million for retirement contributions, US$0.4 million for bonuses and US$1.7 million from the exercising or settlement of share options. The non-executive directors received US$0.6 million in directors' fees. The aggregate of remuneration received by executive management was US$2.4 million (including share options exercised).

During 2015, the executive directors received remuneration of US$1.9 million, comprising of US$1.5 million for salaries, US$0.03 million for retirement contributions, US$0.3 million for bonuses and US$0.04 million from the exercising of share options. The non-executive directors received US$0.7 million in directors' fees. The aggregate of remuneration received by executive management was US$3.0 million (including share options exercised).

The following directors and prescribed officers own shares in Harmony at year-end:

	Number of shares	
Name of director/prescribed officer	**2016**	2015
Directors		
Andre Wilkens	**101 303**	101 303
Frank Abbott	**521 790**	203 243
Graham Briggs[1]	**n/a**	24 718
Harry 'Mashego' Mashego	**593**	3 096
Ken Dicks	**35 000**	20 000
Prescribed officers		
Alwyn Pretorius[2]	**n/a**	7 987
Beyers Nel[3]	**2 907**	n/a
Johannes van Heerden	**-**	28 184
Phillip Tobias[4]	**11 750**	n/a

[1] Graham Briggs resigned as a director with effect from 31 December 2015.
[2] Alwyn Pretorius resigned from the group with effect from 30 November 2015.
[3] Beyers Nel appointed as chief operating officer of the South African operations with effect from 1 March 2016.
[4] Phillip Tobias appointed as chief operating officer: safety, mining projects, new development and corporate strategy with effect from 1 March 2016.

All the production of the group's South African operations is sent to Rand Refinery in which Harmony holds a 10.38% interest. Refer to note 19.

	US dollar	
Figures in million	**2016**	2015
Sales and services rendered to related parties		
Joint operations	**1**	1
Associates[1]	**1**	-
Total	**2**	1
Purchases and services acquired from related parties		
Associates	**2**	2
Outstanding balances due by related parties		
Associates[1]	**4**	6

[1] Refer to note 18 and 19 for details relating to the loan to associate. The outstanding balance is not secured.

33 COMMITMENTS AND CONTINGENCIES

COMMITMENTS AND GUARANTEES

	US dollar	
Figures in million	**2016**	2015
Capital expenditure commitments		
Contracts for capital expenditure	**14**	11
Share of joint venture's contract for capital expenditure	**4**	2
Authorised by the directors but not contracted for	**35**	21
Total capital commitments	**53**	34

33 COMMITMENTS AND CONTINGENCIES continued

COMMITMENTS AND GUARANTEES continued

There are no significant commitments for operating leases. Contractual obligations in respect of mineral tenement leases amount to US$17.2 million (2015: US$57.2 million). This includes US$16.8 million (2015: US$57.1 million) for the MMJV.

	US dollar	
Figures in million	**2016**	2015
Guarantees[1]		
Guarantees and suretyships	**1**	1
Environmental guarantees[2]	**33**	38
Total guarantees	**34**	39

[1] Guarantees and suretyships of US$0.1 million (2015: US$1.0 million) and environmental guarantees of US$2.5 million (2015: US$3.3 million) relating to the Evander group, have been excluded. These guarantees were cancelled shortly after year end.
[2] These guarantees relate to our environmental and rehabilitation obligation (refer to note 24). At 30 June 2016, US$4.0 million (2015: US$3.8 million) has been pledged as collateral for environmental guarantees in favour of certain financial institutions. Refer to note 15.

CONTINGENT LIABILITIES

CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS

Contingencies will only realise when one or more future events occur or fail to occur. The exercise of significant judgement and estimates of the outcome of future events are required during the assessment of the impact of such contingencies.

Litigation and other judicial proceedings as a rule raise difficult and complex legal issues and are subject to uncertainties and complexities including, but not limited to, the facts and circumstances of each particular case, issues regarding the jurisdiction in which the suit is brought and differences in applicable law. Upon resolution of any pending legal matter, the group may be forced to incur charges in excess of the presently established provisions and related insurance coverage. It is possible that the financial position, results of operations or cash flows of the group could be materially affected by the outcome of the litigation.

The following contingent liabilities have been identified:

(a) On 3 March 2011, judgement was handed down in the Constitutional Court in the case of Mr Thembekile Mankayi v AngloGold Ashanti Limited regarding litigation in terms of the Occupational Diseases in Mines and Works Act (ODIMWA). The judgement allows claimants, such as Mr Mankayi, to institute action against their current and former employers for damages suffered as a result of them contracting occupational diseases which result from their exposure to harmful quantities of dust whilst they were employed at a controlled mine as referred to in ODIMWA. In this regard, should anyone bring similar claims against Harmony in future, those claimants would need to prove that silicosis, as an example, was contracted whilst in the employ of the company and that it was contracted due to negligence on the company's part to provide a safe and healthy working environment. The link between the cause (negligence by the company in exposing the claimant to harmful quantities of dust whilst in its employ) and the effect (the silicosis) will be an essential part of any case.

If Harmony, or any of its subsidiaries were to face a significant number of such claims and the claims were suitably established against it, the payments of compensation of the claims could have a material adverse effect on Harmony or the group's results of operations and financial position. In addition, Harmony or the group may incur significant additional costs arising out of these issues, including costs relating to the payment of fees, levies or other contributions in respect of compensatory or other funds established (if any), and expenditures arising out of its efforts to resolve any outstanding claims or other potential action.

i) *Consolidated class action:*
On 23 August 2012, Harmony and certain of its subsidiaries (Harmony group) were served with court papers in terms of which three former employees made application to the South Gauteng High Court to certify a class for purposes of instituting a class action against the Harmony group. In essence, the applicants want the court to declare them as suitable members to represent a class of current and former mineworkers for purposes of instituting a class action for certain relief and to obtain directions from the court as to what procedure to follow in pursuing the relief required against the Harmony group. Similar applications were also brought against various other gold mining companies for similar relief during August 2012.

On 8 January 2013, the Harmony group, alongside other gold mining companies operating in South Africa (collectively the respondents), was served with another application to certify two classes of persons representing a class of current and former mine workers who work or have worked on gold mines owned and/or controlled by the respondents and who allegedly contracted silicosis and/or other occupational lung diseases, and another class of dependents of mine workers who have died of silicosis and who worked on gold mines owned and/or controlled by the respondents. The Harmony group opposed both applications and instructed its attorneys to defend the application.

Following receipt of the aforesaid application, the Harmony group was advised that there was a potential overlap between the application of 23 August 2012 and the application of 8 January 2013. On 17 October 2013, the five certification applications were consolidated by order of court.

The applications were heard in October 2015. On 13 May 2016, the Johannesburg High Court ordered the certification of a silicosis class and a tuberculosis class, which are to proceed as a single class against the mining companies acted in the application. The companies requested leave to appeal to the Supreme Court of Appeal, which was granted by the Supreme Court of Appeal on 13 September 2016. Harmony submitted its notice of appeal in respect of the transmissibility of the general damages order on 22 July 2016.

33 COMMITMENTS AND CONTINGENCIES continued

CONTINGENT LIABILITIES continued

(a) Silicosis continued

Anglo American South Africa, AngloGold Ashanti, Gold Fields, Sibanye and Harmony (the companies) announced in November 2014 that they have formed a gold mining industry working group to address issues relating to the compensation and medical care for occupational lung diseases in the gold mining industry in South Africa. Essentially, the companies are seeking a comprehensive and sustainable solution which deals both with the legacy compensation issues and future legal frameworks which, while being fair to employees, also ensures the future sustainability of companies in the industry. The companies have engaged all stakeholders on these matters, including government, organised labour, other mining companies and legal representatives of claimants who have filed legal suits against the companies.

Due to the limited information available on the above claim and potential other claims, and the uncertainty of the outcome of the matter, no costs estimation can as yet be made for the possible obligation.

ii) *Individual claims:*
On 3 May 2013, Harmony and one of its subsidiaries received a summons from Richard Spoor Attorneys on behalf of an employee. The plaintiff is claiming R25 million (US$1.7 million) in damages plus interest from Harmony and one of its subsidiaries, and another gold mining group of companies. The plaintiff alleges to have contracted silicosis with progressive massive fibrosis during the course of his employment. At this stage, and in the absence of a court decision on this matter, it is not yet certain as to whether the company will incur any costs (except legal fees) related to the above claim.

Due to the limited information available on the above claim and the uncertainty of the outcome of the consolidated class certification application, no costs estimation can as yet be made for the possible obligation.

(b) On 1 December 2008, Harmony issued 3 364 675 Harmony shares to Rio Tinto Limited (Rio Tinto) for the purchase of Rio Tinto's rights to the royalty agreement entered into prior to our acquisition of the Golpu deposits in PNG. The shares were valued at US$23 million on the transaction date. An additional US$10 million in cash will be payable when the decision to mine is made. Of this amount, Harmony is responsible for paying the first US$6 million, with the balance of US$4 million being borne equally by the joint operators.

(c) The group may have a potential exposure to rehabilitate groundwater and radiation that may exist where the group has and/or continues to operate. The group has initiated analytical assessments to identify, quantify and mitigate impacts if and when (or as and where) they arise. Numerous scientific, technical and legal studies are underway to assist in determining the magnitude of the contamination and to find sustainable remediation solutions. The group has instituted processes to reduce future potential seepage and it has been demonstrated that Monitored Natural Attenuation (MNA) by the existing environment will contribute to improvement in some instances.

At 30 June 2016, the group was in the process of implementing water treatment facilities at Doornkop and at Kusasalethu. These treatment facilities will reduce our dependency on Rand Water and allow the mines to supply their own water. The facilities will also enable the operations to manage any post closure decant should this ever arise.

In terms of Free State operations, Harmony has taken the initiative to develop a comprehensive regional closure plan which will ensure that there is sufficient water for our organic growth initiatives. The geohydrological studies confirm that there is no risk of decant in Welkom.

Should the group determine that any part of these contingencies require them being recorded and accounted for as liabilities, that is where they become estimable and probable, it could have material impact on the financial statements of the group.

(d) Due to the interconnected nature of mining operations in South Africa, any proposed solution for potential flooding and potential decant risk posed by deep groundwater needs to be a combined one, supported by all the mines located in these goldfields. As a result, the Department of Mineral Resource and affected mining companies are involved in the development of a regional mine closure strategy. Harmony operations have conducted a number of specialist studies and the risk of surface decant due to rising groundwater levels has been obviated at the entire Free State region and Kalgold. Therefore there is no contingency arising from these operations. Additional studies have been commissioned at Doornkop and Kusasalethu. In view of the limitation of current information for accurate estimation of a liability, no reliable estimate can be made for these operations.

(e) The individual Harmony mining operations have applied for the respective National Water Act, Section 21 Water Use Licenses (WUL) to the Department of Water and Sanitation (DWS). As part of the Water Use License Application (WULA) process for the respective operations, Harmony has requested certain exemptions (relevant to the respective mining operations) from GNR 704 of 4 June 1999, "Regulations on the use of water for mining and related activities aimed at the protection of water resources". The respective WULA's have subsequently not yet been approved by DWS. The WUL conditions for the respective operations are subsequently not yet known and the subsequent potential water resource impact liability as part of the mine rehabilitation and closure process (to which DWS is an important participant and decision maker) is uncertain.

(f) In terms of the sale agreements entered into with Rand Uranium, Harmony retained financial exposure relating to environmental disturbances and degradation caused by it before the effective date, in excess of R75 million (US$5.1 million) of potential claims. Rand Uranium is therefore liable for all claims up to R75 million (US$5.1 million) and retains legal liability. The likelihood of potential claims cannot be determined presently and no provision for any liability has been made in the financial statements.

(g) Legal proceedings commenced in December 2010 against the Hidden Valley mine in PNG over alleged damage to the Watut River (which runs adjacent to the Hidden Valley mine), alleged to have been caused by waste rock and overburden run-off from the mine. The damages sought by the plaintiffs were not specified. The defendants intend to defend the claims. No active steps have been taken by the plaintiffs in this proceeding for more than five years. It is not practicable to make any reasonable assessment of the prospects of the plaintiffs succeeding should they proceed with these claims, nor the potential liability of the defendants if the plaintiffs were to succeed. As a result, no provision has been recognised in the financial statements for this matter.

34 SUBSEQUENT EVENTS

(a) On 7 July 2016, Harmony repaid the remaining R300 million (US$20.0 million) outstanding on the R1.3 billion Nedbank ZAR facility.

(b) During July 2016, Harmony entered into short term gold forward sale contracts for a total of 13 440 kg/432 000 oz over a period of 24 months. These contracts manage variability of cash flows for approximately 20% of the group's total production and were concluded at an average gold price of R682 000/kg. We plan on applying cash flow hedge accounting to these contracts. The financial effect will be determined as the contracts mature as the realised gain or loss is dependant on the R/kg gold price on the date of maturity.

(c) On 15 August 2016, the board declared a dividend of 50 SA cents (4 US cents) for the year ended 30 June 2016. US$14.9 million was paid on 19 September 2016.

(d) On 19 September 2016, Harmony announced that it would acquire Newcrest's 50% of Hidden Valley for a cash consideration of US$1, subject to certain regulatory approvals. Harmony will assume all liabilities and expenses related to the Hidden Valley joint venture and mine, including all closure, rehabilitation and remediation obligations, with effect from 31 August 2016. Newcrest will pay an amount of US$22.5 million as its once-off contribution towards Hidden Valley's future closure liability. Harmony and Newcrest will remain joint venture partners in the Wafi-Golpu project.

The transaction became unconditional on 25 October 2016. Management will begin the process for the purchase price allocation in accordance with IFRS 3, *Business Combinations.* An updated life-of-mine plan will be completed for Hidden Valley. On completion of the transaction, 100% of the operation's assets, liabilities, income and expenses will be recognised in the financial statements.

35 SEGMENT REPORT

ACCOUNTING POLICY

Operating segments are reported in a manner consistent with the internal reporting provided to the chief operating decision-maker (CODM). The chief operating decision-maker has been identified as the executive committee.

The group has one main economic product, being gold. In order to determine operating and reportable segments, management reviewed various factors, including geographical location as well as managerial structure. It was determined that an operating segment consists of a shaft or a group of shafts or open pit mine managed by a single general manager and management team.

After applying the quantitative thresholds from IFRS 8, the reportable segments were determined as: Kusasalethu, Doornkop, Phakisa, Tshepong, Masimong, Target 1, Bambanani, Joel, Unisel, Target 3 and Hidden Valley. All other operating segments have been grouped together under all other surface operations.

When assessing profitability, the CODM considers the revenue and production costs of each segment. The net of these amounts is the production profit or loss. Therefore, production profit has been disclosed in the segment report as the measure of profit or loss. The CODM also considers capital expenditure when assessing the overall economic sustainability of each segment. The CODM, however, does not consider depreciation or impairment and therefore these amounts have not been disclosed in the segment report.

Segment assets consist of mining assets and mining assets under construction included under property, plant and equipment which can be attributed to the segment. Current and non-current group assets that are not allocated at a segment level form part of the reconciliation to total assets.

A reconciliation of the segment totals to the group financial statements has been included in note 36.

35 SEGMENT REPORT continued

	Revenue 30 June			Production cost 30 June			Production profit/(loss) 30 June			Mining assets 30 June			Capital expenditure 30 June			Ounces produced [1] 30 June			Tons milled [1] 30 June		
	2016	2015	2014	2016	2015	2014	2016	2015	2014	2016	2015	2014	2016	2015	2014	2016	2015	2014	2016	2015	2014
		US$ million			US$ million			US$ million			US$ million			US$ million			oz			t'000	
South Africa																					
Underground																					
Kusasalethu	**143**	169	189	**125**	174	169	**18**	(5)	20	**256**	298	341	**25**	40	49	**124 198**	127 092	150 916	**736**	1 001	1 260
Doornkop	**102**	107	109	**72**	95	106	**30**	12	3	**203**	184	319	**14**	21	23	**87 772**	85 618	83 687	**695**	665	812
Phakisa	**151**	124	124	**95**	103	103	**56**	21	21	**288**	354	433	**22**	35	35	**128 217**	100 246	95 680	**756**	674	636
Tshepong	**190**	170	176	**127**	141	132	**63**	29	44	**283**	331	372	**21**	27	29	**161 751**	137 540	135 772	**1 200**	1 095	1 044
Masimong	**91**	98	113	**72**	87	95	**19**	11	18	**33**	73	100	**8**	15	16	**78 190**	79 187	87 385	**716**	739	739
Target 1	**126**	152	188	**86**	104	101	**40**	48	87	**192**	229	261	**22**	26	28	**108 895**	122 944	144 453	**814**	826	851
Bambanani [2]	**112**	116	124	**56**	62	66	**56**	54	58	**55**	68	79	**7**	10	12	**96 870**	93 495	95 424	**256**	253	263
Joel	**84**	91	96	**57**	67	64	**27**	24	32	**49**	48	42	**15**	16	14	**73 239**	72 596	75 072	**597**	607	604
Unisel	**64**	67	77	**52**	60	58	**12**	7	19	**37**	49	63	**4**	9	8	**54 785**	54 495	59 093	**467**	460	450
Target 3 [3]	**-**	19	59	**-**	15	54	**-**	4	5	**36**	44	51	**-**	2	13	**-**	15 529	45 429	**-**	99	331
Surface																					
All other surface operations	**110**	117	122	**88**	95	95	**22**	22	27	**30**	40	45	**4**	4	4	**95 553**	94 105	93 236	**12 112**	11 488	11 516
Total South Africa	**1 173**	1 230	1 377	**830**	1 003	1 043	**343**	227	334	**1 462**	1 718	2 106	**142**	205	231	**1 009 470**	982 847	1 066 147	**18 349**	17 907	18 506
International																					
Hidden Valley	**91**	118	138	**84**	100	105	**7**	18	33	**44**	114	340	**5**	11	12	**72 565**	94 619	105 840	**1 906**	2 012	2 207
Total international	**91**	118	138	**84**	100	105	**7**	18	33	**44**	114	340	**5**	11	12	**72 565**	94 619	105 840	**1 906**	2 012	2 207
Total operations	**1 264**	1 348	1 515	**914**	1 103	1 148	**350**	245	367	**1 506**	1 832	2 446	**147**	216	243	**1 082 035**	1 077 466	1 171 987	**20 255**	19 919	20 713
Reconciliation of the segment information to the consolidated income statements and balance sheets (refer to note 36)	**-**	-	-	**-**	-	-				1 009	1 140	1 406									
	1 264	1 348	1 515	**914**	1 103	1 148				**2 515**	2 972	3 852									

[1] Production statistics are unaudited.
[2] Includes Steyn 2 for the June 2014 amounts.
[3] Target 3 was placed on care and maintenance in October 2014.

36 RECONCILIATION OF SEGMENT INFORMATION TO CONSOLIDATED INCOME STATEMENTS AND BALANCE SHEETS

	US dollar		
Figures in million	2016	2015	2014
Reconciliation of production profit to consolidated profit/(loss) before taxation			
Total segment revenue	**1 264**	1 348	1 515
Total segment production costs	**(914)**	(1 103)	(1 148)
Production profit	**350**	245	367
Cost of sales items other than production costs	**(174)**	(542)	(401)
Amortisation and depreciation of mining assets	**(144)**	(211)	(202)
Amortisation and depreciation of assets other than mining assets	**(5)**	(5)	(5)
Rehabilitation credit/(expenditure)	**3**	1	(1)
Care and maintenance cost of restructured shafts	**(8)**	(9)	(6)
Employment termination and restructuring costs	**(1)**	(22)	(26)
Share-based payments	**(23)**	(18)	(26)
Reversal of impairment/(impairment) of assets	**3**	(285)	(135)
Other	**1**	7	-
Gross profit/(loss)	**176**	(297)	(34)
Corporate, administration and other expenditure	**(28)**	(33)	(42)
Social investment expenditure	**(4)**	(6)	(9)
Exploration expenditure	**(13)**	(23)	(44)
Loss on scrapping of property, plant and equipment	**(4)**	(42)	-
Foreign exchange translation loss	**(13)**	(32)	(18)
Other income/(expenses) (net)	**(3)**	-	1
Operating profit/(loss)	**111**	(433)	(146)
Profit/(loss) from associate	**-**	(2)	(10)
Profit on disposal of investments	**-**	-	1
Net gain on financial instruments	**1**	1	16
Investment income	**16**	20	21
Finance costs	**(19)**	(22)	(27)
Profit/(loss) before taxation	**109**	(436)	(145)
Reconciliation of total segment assets to consolidated assets includes the following:			
Non-current assets			
Property, plant and equipment	**527**	598	670
Intangible assets	**59**	73	84
Restricted cash	**4**	4	4
Restricted investments	**170**	196	217
Deferred tax asset	**-**	-	8
Inventories	**3**	3	5
Other non-current receivables	**12**	7	-
Current assets			
Inventories	**79**	106	145
Restricted cash	**1**	1	1
Trade and other receivables	**44**	62	90
Income and mining taxes	**-**	2	10
Derivative financial assets	**25**	-	-
Cash and cash equivalents	**85**	88	172
	1 009	1 140	1 406