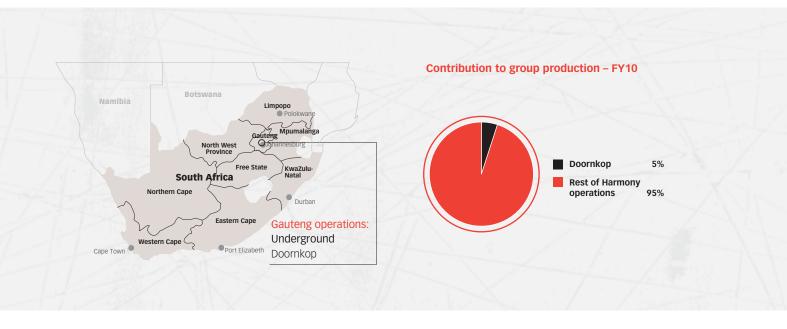
#### Review of operations - South Africa

# Doornkop



## **Description**

Located 30 kilometres west of Johannesburg in Gauteng, Doornkop is a single-shaft operation mining to a depth of just less than 2 000m. Doornkop mines the Kimberley and South reefs by means of both narrow-reef conventional mining and mechanised bord-and-pillar mining. Ore mined is processed at Doornkop's carbon-in-pulp plant. Production at Doornkop's South Reef Project which accesses the higher grade South Reef continues to ramp up. Full production at this project is scheduled for FY15.

Doornkop employed 2 649 people in FY10, of whom 1 645 were employees and 1 004 contractors.

Detailed information on Doornkop's resources and reserves are available in the *Mineral resources and mineral reserves* section of this annual report on pages 143 to 146.

### Safety

Although there was an improvement in certain safety indicators at Doornkop in FY10, there were most regrettably two fatalities (FY09: no fatalities). The LTIFR improved to 5.50 per 1 million hours worked (FY09: 6.25). A greater focus on safety-related matters led to streamlined procedures and improved training, maintenance and behaviour.

More detailed information on safety performance and Harmony's sustainable development concerns in South Africa can be found in the online *Sustainable Development Report* on the corporate website, www.harmony.co.za. A summary of this can be found on pages 26 to 46 of this annual report.

### Doornkop key statistics

Production		FY10	FY09	FY08
Volumes milled	000t (metric)	540	549	448
	000t (imperial)	595	605	494
Gold produced	kg	1 950	1 311	1 370
	OZ	62 694	42 150	44 038
Average grade	g/t	3.61	2.38	3.06
	oz/t	0.105	0.070	0.089
Financial				
Revenue	R million	517	343	258
	US\$ million	68	38	35
Operating cost*	R/kg	200 324	232 699	175 178
	US\$/oz	822	804	749
Operating profit	R million	107	62	33
	US\$ million	14	7	4
Capital expenditure	R million	342	395	349
	US\$ million	45	44	48

Sustainability		
Number of employees		
Employees		1 645
Contractors		1 004
Total		2 649
HDSAs in management**	%	38
Women in mining**	%	8
Expenditure on training		
and development	R million	10
Safety		
No. of fatalities		2
LTIFR	per million hours worked	5.50
Environment		
Energy used	000MWh	155
Water used for primary activities	000m³	2 725
GHG emissions	000t CO <sub>2</sub> e	184
Expenditure on local economic development	R million	4
Status of mining right	New order mining right granted in December 2007	

<sup>\*</sup> Includes royalty payment in FY10

 $<sup>\</sup>ensuremath{^{**}}$  Indicator reported in terms of the MPRDA and the South African Mining Charter

#### Review of operations - South Africa

## Doornkop cont.

#### **Operations review**

Despite a 2% decline in volumes milled to 540 000 tonnes, an increase of 52% in grade contributed to gold produced being 49% up at 62 694 ounces year-on-year. The much improved grade was a result of the growth in high-grade volumes mined from the South Reef and under achievement on the low-grade Kimberley Reef as well as a high mine call factor for the shaft as a whole.

The greater volume of South Reef ore mined was in line with the build up of production at the South Reef project. Tonnes mined from South Reef mining areas accounted for 50% of total tonnes mined in FY10 – up from 30% the year before – while the contribution from the Kimberley Reef declined from 70% to 50%. The average grade of South Reef tonnes mined rose to 5.4g/t while that of the Kimberley Reef remained flat.

The low-grade Kimberley Reef operation is mechanised and production during the year was compromised by the lack of availability of trackless machinery. The new trackless fleet that has been purchased will improve production in the coming year.

There was a steady improvement in development metres achieved which will help to ensure that the build-up in the South Reef project is achieved and that targets are met. Problems were however encountered with the equipping of the shaft in terms of the South Reef project given the temporary shaft time constraints experienced. The winder compartments were subsequently equipped and the conveyor belt on 212 level (shaft bottom) was completed.

Much effort has been put into increasing our understanding of the geology of the South Reef orebody. This work has led to an increase in South Reef reserve ounces with the move in resources from inferred to indicated and measured categories, and has also increased confidence in the life-of-mine production plan. Further work to improve the geological model of the South reef continues.

There is currently a four-year plan in place for the mining of the Kimberley Reef in terms of which production areas on the Kimberley Reef will account for up to 75% of Doornkop's total gold production annually. This proportion will decline as higher-grade volumes from the South Reef project build up. A new geological model has been developed of the Kimberley Reef to identify target areas for exploration, the results of which may extend the four-year plan currently in place.

The mine as a whole is building up to mine and process 1.6Mt annually.

#### Financial review

The higher gold price received together with the significant increase in ounces produced resulted in revenue for the year being 51% higher in rand terms and 79% up in dollar terms. Production costs of R410 million (\$54 million) were 46% and 74% up in rand and dollar terms respectively. These increases were largely driven by higher labour costs, owing to the build up in the staff complement in anticipation of the operation's future production profile, by once-off transport costs incurred around the surface conveyor belt fire, and by additional store costs related to the equipping of the South Reef workplaces.

Despite the cost increases, cash operating profit increased by 73% to R107 million. Capital expenditure of R342 million (\$45 million) exceeded the planned amount of R305 million owing to repairs done to a fire-damaged surface conveyor belt (R28 million), the purchase of trackless equipment for the Kimberley Reef section and an approved change in the scope of the South Reef project following on the delays resulting from the lack of shaft time. In all, the bulk of this expenditure (66%) was on the South Reef project.

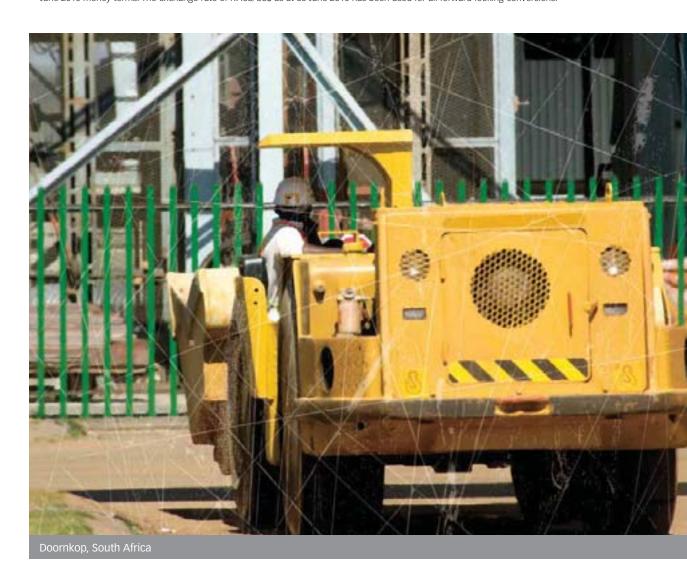
#### Outlook\*

The build-up of production from the South Reef continues with full production from this project scheduled for the last quarter of FY15. Tonnes mined are forecast at around 993 000 tonnes in FY11, at a recovered grade of 3.59g/t. South Reef ore is expected to account for 53% of the total milled and 74% of the gold produced in FY11. Cash costs\*\* are anticipated to improve to approximately R181 200/kg (US\$739/oz) in FY11.

Planned capital expenditure\*\* for FY11 is R320 million (\$42 million) – R 136 million (\$18 million) on on-going development, R49 million (\$6 million) on other shaft capital and major equipment maintenance and R 135 million (\$18 million) on the South Reef project.

Currently productivity levels of 122g/TEC are forecast to improve to 131g/TEC in FY11.

- \* Please refer to the forward-looking statements
- \*\* June 2010 money terms. The exchange rate of R7.63/US\$ as at 30 June 2010 has been used for all forward-looking conversions.



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