

HEALTH AND SAFETY FOCUS

RE-ENERGISING THE SAFETY FOCUS supported by our proactive health, safety and wellbeing strategy



OUR APPROACH TO SAFETY, HEALTH AND WELLBEING

Our employees are our most important asset. In order to keep our workforce safe and healthy, we focus on compliance and systematically reducing employees' exposure to risk. We are therefore committed to:

- identifying and ranking risks
- finding technical and procedural engineering solutions in terms of a risk mitigation hierarchy to eliminate risk completely, if possible
- controlling risk at source
- minimising risk factors
- monitoring risk exposure
- providing personal protective equipment

To this end, it is essential to create alignment with relevant stakeholders. As required by the Mine Health and Safety Act, 1996 (Act No 29 of 1996), all employees are represented in formal joint management-worker health and safety committees to ensure that our occupational health and safety programmes are agreed and effective.

Our safety, health and wellbeing strategy, supported by our CARES values (commitment, accountability, respect, enabling and safety), is illustrated below.

For more information, please refer to our health and safety policy at <https://www.sibanyegold.co.za/sustainability/health-and-safety>.



HEALTH AND SAFETY FOCUS CONTINUED

SAFETY

PERFORMANCE OVERVIEW

It is with deep regret that Sibanye reports the death of 14 employees during the year under review – 12 employees within the Gold Division and two employees in the Platinum Division (during the period the assets were owned by Sibanye).

In memoriam

Date	Full name	Age	Operation	Occupation	Cause of fatality
2 February 2016	Moreruoa Mahao	57	Cooke	Miner stoper	Fall of ground – gravity
12 February 2016	Tanki Sebolai	32	Cooke	Relieving team leader	Winches and rigging
12 March 2016	Elliot Kenosi	53	Beatrix	Scraper winch operator	Heat related
18 March 2016	Luis Alberto Massango	34	Kloof	Sweeping tool operator	Fall of ground – gravity
7 April 2016	Mzwandile Chitha	32	Cooke	Stope crew	Fall of ground – seismicity
21 May 2016	Pieter Janse van Rensburg	49	Driefontein	Fitter	Drowning
12 June 2016	Qamako Mpananyane	42	Beatrix	Team leader	Tramming
27 June 2016	Moeketsi Thaane	40	Cooke	Rock drill operator	Fall of ground – gravity
11 July 2016	Mongezi Bagege	37	Driefontein	Loco driver	Tramming
21 July 2016	Enock Dumisa Tsabedze	52	Kloof	Miner stoper	Fall of ground – gravity
27 July 2016	Johannes Masithela	33	Beatrix	Mining team	Tramming
19 August 2016	Simin Kabelo Rangwaga	38	Kroondal	Electrician	Trackless machinery
2 November 2016	Teboho Molise	44	Kloof	Assistant grade 1 construction	Material handling
17 November 2016	Cekiso Zamicebo	42	Kroondal	Spotter	Fall of ground – gravity

Safety performance statistics

	2016			2015	2014	2013
	Group	Platinum Division	Gold Division	Gold Division	Gold Division	Gold Division
Fatalities	14	2	12	7	12	9
Fatal injury frequency rate *	0.10	0.09	0.11	0.06	0.12	0.10
Lost-time injury frequency rate *	6.62	4.84	6.99	6.74	5.87	6.13
Serious injury frequency rate *	4.16	2.88	4.42	4.68	3.88	3.50
Medically treated injury frequency rate **	3.85	5.72	3.47	3.60	3.37	4.32
No. of Section 54 work stoppages	226	55	171	109	77	55
No. of production shifts lost owing to Section 54 stoppages	402	245	157	70	99	35
No. of internal work stoppages ***	21,849	2,044	19,805	18,642	16,423	10,383

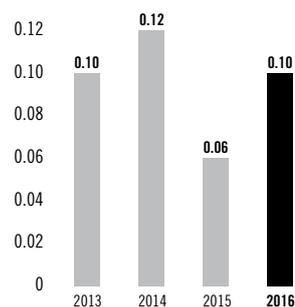
* Per million hours worked

** Also referred to as treat-and-return injury frequency rate (TRIFR). Includes certain minor injuries

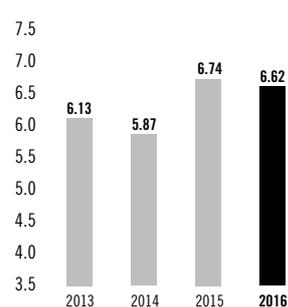
*** Internal stoppages are an integral part of Sibanye's risk management strategy (any person can stop a task or workplace until arrangements have been made to reduce high risk)

Note: Data for 2014 includes Cooke from March 2014 onwards and data for 2016 includes the former Aquarius operations from April 2016 and the Rustenburg operations from November 2016

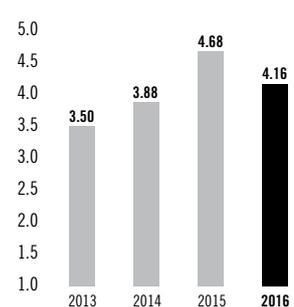
Group – FIFR (per million hours worked)



Group – LTIFR (per million hours worked)



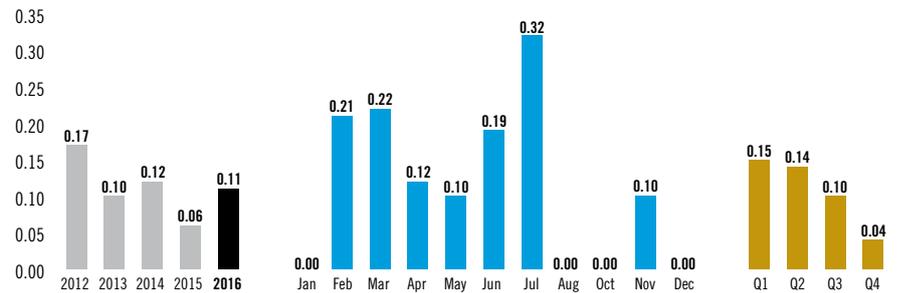
Group – SIFR (per million hours worked)



Note: Data for the Group for the years 2013 to 2015 is comparable with that of the Gold Division in 2016. Group data for 2016 includes the Gold Division as well as the platinum operations (Platinum Division) for the period of Sibanye's ownership during the year

Despite a general improvement in the fatality rate prior to 2016, there was a disappointing regression in fatalities during the first six months of 2016 in the Gold Division. In the first half of the year, eight fatalities were recorded, raising serious concerns at executive level. A series of high-level safety workshops were held and an urgent 12-point safety plan devised. Following its implementation, safety performance improved with four fatalities recorded by the Gold Division in the second half of the year.

Gold Division – FIFR

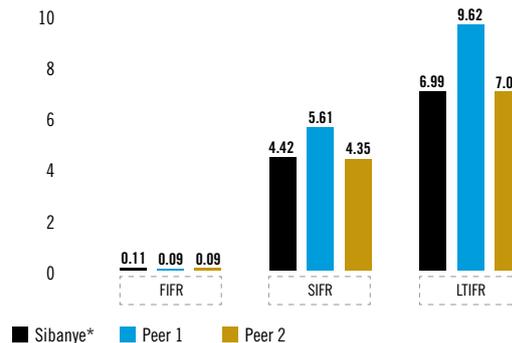


Regrettably, in 2016, the Gold Division's fatal injury frequency rate (FIFR) deteriorated by 83% year on year and the lost-time injury frequency rate (LTIFR) by 4%. Most lost-time injuries in 2016 were caused by falls of ground as well as by tools and equipment, slip-trip-and-fall, and materials handling incidents. Intervention strategies have been put in place to rectify trends.

A 6% improvement was recorded in the Gold Division's serious injury frequency rate.



**Safety performance 2016:
Gold mining sector peer comparison**



* Gold Division

How we performed:

- **LTIFR**, better than peers
- **SIFR**: considerably better than peer 2 and marginally worse than peer 1
- **FIFR**: worse than peers



Safety achievements 2016

Three million fatality-free shifts	Driefontein Khomanane
Two million fatality-free shifts	Burnstone Driefontein Mining Unit 3 Beatrix operations Gold Division
One and a half million fatality-free shifts	Beatrix Mining Unit 1 (North)
One million fatality-free shifts	Beatrix operations Gold Division Driefontein operations (twice) Sibanye group (twice) Driefontein Ya Rona Cooke operations
Half a million fatality-free shifts	Beatrix Mining Unit 3
Full year without recording a lost-time injury	Beatrix Plant 2 Driefontein Plant 1 Kloof 2 plant

HEALTH AND SAFETY FOCUS CONTINUED

ADDRESSING OUR SAFETY PERFORMANCE – SHARP! SHARP!

A new safety campaign, known as “Sharp! Sharp!”, was rolled out in 2016 to encourage safe behaviour, address the regression in our safety performance, counter the decline in the FIFR in the first half of the year and to reintroduce a culture of continuous improvement. This campaign includes short, medium and long-term plans.

Short-term plans initiated to refocus and re-energise our safety performance included:

- Restructuring the safety department by appointing a senior executive in the office of the CEO to spearhead our health and safety strategy
- Launching the new safety value now included in our CARES value system and the roll out of the “Sharp! Sharp!” campaign across the Group to reaffirm our commitment to safety
- Entrenching visible-felt leadership by executive and senior management at the operations to ensure close out of action plans and high potential hazards that warrant an immediate stop and fix
- Establishing an Executive Safety Subcommittee to ensure that our safety strategy is implemented accordingly and that operations are accountable
- Setting up a zero harm task team to investigate serious incidents and ensure that recommendations are implemented to prevent recurrence
- Reviews of all fatalities by the Office of CEO to ensure close outs are made to prevent recurrence.

Medium-term plans to ensure that safety is constantly top of mind include:

- Changing the hearts and minds of our employees to be more safety conscious in the workplace and adopt a safety first attitude as a way of life – training is provided to encourage accountability for safety incidents or substandard conditions (including a new slogan: “I am safe! We are safe! Phepha mina! Phepha zonke!”)
- Restructuring the entire safety department to ensure appropriate allocation of skills
- Implementing measures that ensure employees comply with the safety system to reduce non-compliances, substandard conditions and accidents.

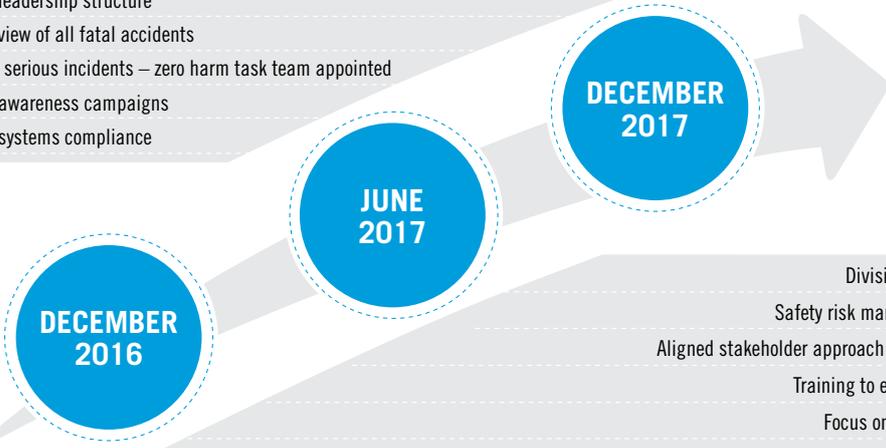
Long-term safety plans (see 12-point plan below) include:

- Aligning systems in the safety department across both divisions to ensure common understanding and a single reporting system that enables the sharing of experiences and knowledge of best practice
- Documenting the new safety management system to guide management of safety
- Securing tripartite commitment from Sibanye, the Mine Health and Safety Council and the DMR in support of a more effective safety management process at all operations



OUR 12-POINT SAFETY IMPROVEMENT PLAN

- ✓ Executive safety leadership
- ✓ Safety leadership structure
- ✓ CEO review of all fatal accidents
- ✓ Review serious incidents – zero harm task team appointed
- ✓ Safety awareness campaigns
- ✓ Safety systems compliance



DECEMBER 2017

JUNE 2017

DECEMBER 2016

- Divisional safety structures approved ✓
- Safety risk management regarding A hazards* ✓
- Aligned stakeholder approach to enhance safety management ○
- Training to enhance management capability ○
- Focus on safety mind-set and behaviour ○
- Consolidation of safety systems into combined Sibanye Safety Strategy ○

* A hazards are those with high potential to cause accidents. When identified, they must be rectified immediately

✓ Action completed ○ Action underway ○ Action initiated

EFFECTS OF S54 SAFETY STOPPAGES 2016

GOLD DIVISION

No. of stoppages: 171

Revenue lost: R649 million

PLATINUM DIVISION

No. of stoppages: 55

Revenue lost: R223 million

SIBANYE TOTAL

No. of stoppages: 226

Revenue lost: R872 million

SECTION 54 NOTICES

Despite the improvement in the safety performance of the Gold Division following management's proactive safety intervention in August 2016. The frequency of Section 54 safety stoppage notices (S54s) issued remained high. S54s are issued by the DMR, in terms of the Mine Health and Safety Act 29 of 1996, in instances of dangerous occurrences, practices and conditions. S54s are however only supposed to be issued in exceptional circumstances. Sibanye supports the application of S54s when safety transgressions occur, however, their application is frequently inconsistent and their scope unwarranted. The effects of such stoppages are severe and they may impact the future viability of our operations as well as employment. In addition, if S54 stoppages results in mining activity being suspended for an extended period of time, there are serious safety implications.

A total of 226 Section 54 notices were issued to Sibanye by the Department of Mineral Resources in 2016 – 171 to the Gold Division and 55 to the Platinum Division. These notices resulted in the loss of 402 production shifts – 157 in the Gold Division and 245 in the Platinum Division. The S54s were issued mostly in the wake of serious injury incidents where substandard safety conditions were identified due to non-compliance with standards.

FUTURE FOCUS

Having established our Safe Technology department (see review on page 48) in June 2014, and recognising that a step change in safety performance requires innovative technologies to engineer out risk, we continue to work towards eliminating inherent safety risks by developing and implementing systems, such as mechanised equipment, that reduce employees' exposure to risk.

We continue to pursue technology projects that will greatly reduce our risk profile and thus improve our safety performance with concomitant cost and productivity gains. See the Technology section.

In the coming year, we will continue to roll out our "Sharp! Sharp!" campaign across the Group. This initiative is being led by our vice presidents and the Executive Safety Subcommittee under the guidance of our chief executive.

Zero harm task teams will also be responsible for investigating high-potential accident risks.

As industry stewards, we will also continue to play a leading role in supporting the development of technology and new generation mining through the Chamber of Mines.

SAFETY TARGETS

As we strive towards zero harm, executive management has set a safety improvement target of 10% (for all classes of injuries) at each operation for 2017 to ensure a consistent decline in the incidence of injuries, in line with our safety and health policy.



HEALTH AND SAFETY FOCUS CONTINUED

HEALTH AND WELLBEING

PERFORMANCE

Sibanye's health model is based on the proactive management of employee health and wellbeing. It aims to provide accessible primary healthcare to support the prevention, early detection and management of disease, and also to prevent disabilities. Early identification of health risks together with intervention and stringent application of the mandatory code of practice on the minimum standards of fitness to perform work at a mine are critical.

Previously, the focus of healthcare was curative rather than preventive in nature. Healthcare was provided at centralised, company-owned mine hospitals which was time consuming to access, resulting in high rates of absenteeism at work. Since 2011, when we reported an average of 13.8 days lost per employee for the year, our average sick leave rate has improved by 9% to 12.6 days lost in 2016. We attribute this improvement to the provision of accessible primary healthcare to all employees at shaft clinics that serve as entry points to our extended network of service providers.

A sustainable healthcare system has been created so that employees can optimise their health throughout their working years and into retirement, with Sibanye assisting them to make informed healthcare decisions. Employees, their families and communities are encouraged to pursue healthy lifestyles. To this end, community infrastructure projects that enable access to affordable, quality healthcare have been developed. Strong interdependent relationships with local stakeholders, including the Department of Health, facilitate the integration of regional healthcare systems to ensure the effective use of resources.

Sibanye offers employees an array of healthcare products, including medical aid insurance and statutory insurance benefits for occupational injuries and diseases. Employees are given a choice in selecting their medical aid cover and can choose either the company-funded product or any of a number of designated medical schemes, including Sibanye's own restricted (in-house) medical scheme. Medical schemes and options are chosen carefully in terms of strict criteria so that employees receive benefits at an affordable cost.

In the Gold Division, 81% of employees have chosen the company-funded option and 19% have opted for various other medical schemes. All employees in the Platinum Division are members of an external open (public) medical scheme.

The 2016 data reported for the Platinum Division has been annualised for the purposes of monitoring health trends, comparative analysis of both communicable, non-communicable and occupational diseases and the objective measurement of progress made with health programmes in the newly-acquired operations. The statistics reflect the disease burden at the platinum operations for the entire year and have not been disaggregated to reflect liability in terms of ownership.

Moving from curative to preventative healthcare and promoting a healthy workforce

ABSENTEEISM

Absenteeism, which includes mine accident sick leave, medical sick leave, occupational health, unpaid leave, absent without permission (AWOP), training, annual leave and other, has a significant effect on productivity and remains a major challenge. The decrease in the number of days lost due to sick leave within the Gold Division can be attributed to our proactive healthcare, and the provision of accessible, preventative, primary, healthcare at shaft level (see page 77). The total percentage of unavailable days over the past few years has declined to 15.1%, of which medical sick leave has declined to around 3% (compared to 4-5% previously).

The absenteeism rate (of unavailable labour) of 18% in the Platinum Division at the end of 2016 will be addressed in terms of Sibanye's overall health strategy in 2017.

Note: Absenteeism rate is the percentage of labour unavailable while absenteeism applies to medical sick leave, mine accident sick leave and absence from work for human resources reasons such as leave and leave without permission

Healthcare funding (R million)

	2016				2015	2014
	Group	%	Platinum Division	Gold Division	Gold Division	Gold Division
Medical schemes	679	56	400	279	296	282
Company-funded	336	28	31	305	323	357
Compensation for occupational injuries and diseases* (Rand Mutual Assurance Company)	178	16	52	125	115	106
TOTAL	1,193	100	483	709	733	745

* In terms of the Compensation for Occupational Injuries and Diseases Act (COIDA)



Currently, seven schemes are recognised in the Gold Division, 10 at Kroondal and three at the Rustenburg operation. Alexander Forbes, a specialist service provider in medical scheme and employee benefits administration, was contracted to assist with the selection of suitable medical schemes and healthcare products with a view to aligning funders with our strategic objectives, formalising sustainable relationships with a select group of funders, and consolidating the number of schemes.

Sibanye continues to positively influence healthcare funders within the legal framework by working closely with them for the benefit of each employee. Case managers and clinical teams are assisted to provide on-site preventative services, including screening for and monitoring of communicable and non-communicable diseases in the workplace, through our disease management programmes.

Sibanye's approach to healthcare has been acknowledged by the University of the Witwatersrand's School of Public Health, as has its work on developing a primary healthcare delivery model with the Geisel School of Medicine, Dartmouth College, New Hampshire in the United States.

In the third year of a planned three-year roll out of our healthcare model, the following outcomes were achieved in 2016:

- **Improved wellbeing:** a result of the increased emphasis on education and awareness about key health topics as well as disease prevention. Tuberculosis (TB) screening increased to 122,842 screenings from a base of 47,269 in 2015 and HIV testing to more than 11,989 tests in 2016 (2015: 8,505 and 2014: 5,038)
- **Improved clinical metrics:** The total TB rate has decreased significantly from 19.19 per 1,000 employees in 2013 to 13.42 in 2016, due, in part, to improved delivery of the TB programme at shaft clinics and the greater active involvement of employees in the highly active anti-retroviral therapy (HAART) programme. Adherence to the HAART programme increased from 85% to 90% over the past year
- **Monitoring of financial performance:** Cost per employee in the Gold Division is R824.82 a month vs. R826.19 in 2015 for Cat 3-8 employees on the company-funded option
- **Reduced hospitalisations:** down by 20% and hospital-bed days declined by 15% in 2016 compared to 2015 for the company-funded option

Overall, significant progress was made in 2016 in embedding the health strategy and achieving efficiencies in the delivery of healthcare. The new healthcare model continues to be cost efficient with improved clinical outcomes, as evidenced by lower death and medical incapacity rates, fewer admissions and readmissions to hospital and improved TB and HAART programme performance.

All of the planned West Wits shaft clinics were completed and commissioned in 2016, which improved access to healthcare for all employees regardless of funding mechanism. The shaft clinics operate on a 12-hourly basis, providing trauma and emergency care, preventative and general wellbeing services as well as disease management.

Clinic attendance exceeded expectations with the more established clinics recording more than a thousand visits a month. More importantly, the visibility and accessibility of healthcare services at the shafts facilitated the rollout of wellbeing services and contributed to improved uptake of screening for communicable and non-communicable diseases as well as better adherence to chronic disease management programmes. Employees diagnosed with communicable and non-communicable diseases are referred to the Sibanye healthcare network of selected specialists and centres of excellence.

HEALTH AND SAFETY FOCUS CONTINUED

DISEASE AND CASE MANAGEMENT

All employees suffering from chronic diseases, such as hypertension, diabetes and asthma which are commonly known as lifestyle diseases, and from infectious diseases, such as HIV and TB, are encouraged to participate in disease management programmes provided by the medical scheme or funder to which they belong. Employees are encouraged to take greater responsibility for their health and quality of life. The number of medical conditions managed on the various programmes is captured in the table below and, as evidenced by the number of conditions and employees requiring such services, warrants investment in such programmes.

How employees are funded

	2016			2015
	Group	Platinum Division	Gold Division	Gold Division
Principal medical scheme members	28,555	20,624	7,931	8,416
Company-funded employees	32,677	–	32,677	31,419

Medical conditions under management

	2016			2015
	Group	Platinum Division	Gold Division	Gold Division
Chronic medical conditions (schemes)	13,242	8,451	4,791	4,700
Chronic medical conditions (company)	9,790	–	9,790	8,814
Total	23,032	8,451	14,581	13,514

Overall, 23,032 medical conditions are managed by company-funded medical services and various medical schemes in the Group. The number reported refers specifically to the number of medical conditions registered on disease management programmes and includes employees who are registered for more than one condition.

CARE AND MANAGEMENT OF HIV/AIDS AND TB VOLUNTARY COUNSELLING AND TESTING

In line with the Department of Health's national initiative to screen 90% of the population for TB and HIV, we have increased access to screening by introducing voluntary annual testing for all employees following certificate-of-fitness examinations. In 2016, Sibanye offered voluntary counselling and testing (VCT) to 54,451 employees and contractors, of whom 28,717 were tested for HIV.

HIV/Aids – voluntary counselling and testing and HAART

	2016			2015	2014
	Group	Platinum Division	Gold Division	Gold Division	Gold Division
VCT offered	54,451	27,226	27,225	23,538	–
VCT conducted	28,717	16,728	11,989	8,505	5,590
HIV-positive	2,243	650	1,593	1,929	1,169
% of workforce tested	39	62	25	18	13
New recipients of HAART ¹	Unknown	Unknown	928	875	548
Category 3-8 employees on HAART	Unknown	Unknown	5,561	5,023	4,604
HAART patients employed by Sibanye (alive and on treatment)	9,925	3,545	6,380	5,750	5,283
Employees off HAART ² (left programme)	86	Unknown	86	127	57
HIV prevalence ³ (%)	8	4	13	22	21

¹ Entry-level mining employees (Category 3-8) employees

² Employees who left the HAART programme within 12 months of starting antiretroviral therapy

³ The prevalence rate reported is based on the number of employees testing positive as a percentage of the total number of employees tested in a given period and not as a percentage of the total workforce

UNAIDS 90-90-90

The South African Department of Health has adopted the United Nations AIDS 90-90-90 targets aimed at reducing the incidence and management of HIV/Aids. The department has rolled out a similar strategy to help achieve its new national development goals for 2020. In support of this, South Africa is also among the first countries in Africa to formally adopt a universal test and treat (UTT) approach in accordance with the new WHO new guidelines on HIV treatment.

UNAIDS 90-90-90 targets aim to ensure that by 2020:

- 90% of all people living with HIV know their status
- 90% of people with diagnosed HIV infection receive sustained ART
- 90% of all people receiving ART have viral suppression

Furthermore, the 90-90-90 target has been included in the department's national TB development goals:

- 90% of the population to be screened
- 90% of people with TB to be diagnosed and begin treatment and
- 90% of those treated for TB should be cured

HIV/AIDS CARE

Sibanye is working towards compliance with the recommendations of the Department of Health, which are aligned with the United Nations target. This facilitates detection and treatment of affected employees, irrespective of funding mechanism, those employees testing positive for HIV/Aids are offered highly-active antiretroviral therapy (HAART) and started immediately on HAART (universal test and treat) and compliance with treatment is monitored through viral suppression.

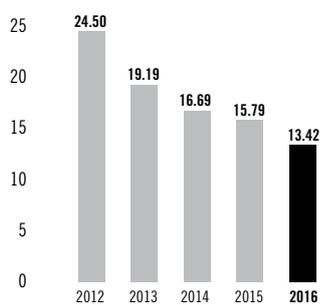
As a result, there was a 6% increase in the number of employees enrolled in the Group-funded HAART programme to 928 in 2016 from 875 in 2015. The number of active participants in the company-funded programme increased by 11% to 5,561 in 2016 from 5,023 in 2015. On a consolidated basis there are 9,925 employees on HAART programmes across the Group which represents 16% of all employees.

TB CARE

Given TB's symbiotic relationship with HIV/Aids and the Department of Health's new TB targets, the same approach to TB has been adopted as with HIV. Consequently, the target is to screen 90% of all employees (see UNAIDS 90-90-90) for TB as well as for HIV/Aids.

In addition, the Mine Health and Safety Council encourages achievement of the Mining Charter milestone which is to reduce the TB rate to below the National TB rate by 2022. The current national TB rate is between 7.5 and 10 per 1,000 people however the National Strategic Plan outlines a TB target of 8.34 per 1,000 by 2015 and 5.84 per 1000 by 2022.

In 2016, a total of 122,834 (2015: 47,269) TB screenings were conducted across the Group and the total TB rate at Sibanye reduced to 13.42 per 1,000 employees at risk (2015: 15.79).

TB rate (per 1,000 employees at risk)**TB – no. of new and retreatment cases**

	2016			2015	2014
	Group	Platinum Division*	Gold Division	Gold Division	Gold Division
TB	707	73	634	744	832
Cardiorespiratory TB	618	73	545	679	715
New cases of multi-drug resistant TB	16	Unknown	16	14	34

* Health data for the Platinum Division (Kroondal and the Rustenburg Operations) covers the entire 12 months of 2016. Tuberculosis has not been reported at the Rustenburg Operations and no data was available as it had been declared a non-controlled operation implying that TB is not recognised as an occupational disease. This will be reviewed and clarified by Sibanye and covered in the next reporting period



HEALTH AND SAFETY FOCUS CONTINUED

OCCUPATIONAL HEALTH MANAGEMENT

Sibanye's occupational health programme focuses on preventing work-related injury and illness by engaging with stakeholders on occupational hygiene, safety and medicine, as well as formalised programmes, risk assessment, fitness to work and medical surveillance.

All employees undergo stringent medical testing annually, as part of a medical-surveillance programme aimed at monitoring the effects of occupational health hazards. The most significant occupational diseases monitored include silicosis, cardiorespiratory TB and noise-induced hearing loss.

Sibanye has made progress in reducing workplace exposure but, given the latency periods, a number of employees continue to present with occupation-related diseases.

Occupational health management

	2016			2015	2014
	Group	Platinum Division	Gold Division	Gold Division	Gold Division
Medical surveillance and certificate-of-fitness examinations – total	140,359	52,408	87,946	84,022	72,082
– Employees	108,135	39,145	68,990	69,294	63,338
– Contractors	32,219	13,263	18,956	14,738	8,744
Days lost due to health-related absenteeism	817,075	340,408	476,667	478,568	414,424

SILICOSIS

There was a reduction in the submitted silicosis rate for the Gold Division to 3.73 per 1,000 employees in 2016 (2015: 4.91). A total of 151 cases were submitted for the year compared to 186 in 2015, 264 cases in 2014 and 129 cases in 2013.

Within the Platinum Division, 89 cases of silicosis were submitted (39 from Kroondal and 50 cases from the Rustenburg operation) to the Medical Bureau of Occupational Diseases for adjudication in 2016. By way of comparison, the silicosis rate is 4.31 per 1,000 employees for Kroondal and 2.8 per 1,000 for the Rustenburg Operation, equivalent to a rate of 3.31 per 1,000 employees for the Platinum Division as a whole. The lower rate for the Platinum Division as compared to that for the Gold Division may be a reflection of the lower levels of crystalline silica present in platinum mining but there is significant movement of employees between the two industries. The effect of dust in the platinum industry however needs to be carefully monitored.

There appears to be an encouraging downward trend in the rates reported, which could be attributed to the adoption of the MOSH Best Practices on Dust Reduction Strategies and the target set by the Mine Health and Safety Council (MHSC) to lower the occupational exposure limit for silica to 0.05mg/m³. However, given the long latency period for the development of silicosis, there is reason to be cautious.

Continued focus on the various dust prevention mechanisms is required to prevent dust liberation at source and ultimately to reduce dust levels and the long-term incidence of silicosis and other occupational lung diseases.

NOISE-INDUCED HEARING LOSS

To reduce the incidence of noise-induced hearing loss (NIHL), which increased to 188 cases in 2016 across both divisions, from 105 in 2015, efforts to lessen noise in the workplace continue through the sourcing of quieter machinery and by providing more effective personal protective equipment.

Submissions of NIHL in the Gold Division increased to 3.12 per 1,000 employees in 2016 compared to 2.82 in 2015. A total of 126 cases were submitted for NIHL compensation compared to 105 cases in 2015 and 138 cases in 2014. Early NIHL, based on hearing loss of between 5% and 10%, declined to 63 cases in 2016 compared to 125 cases in 2015 and 332 cases in 2014.

NIHL in the Platinum Division is reported as 2.31 per 1,000 employees which is slightly less than that for the Gold Division – 2.08 per 1,000 for the Rustenburg Operation and 2.77 per 1000 employees for Kroondal.

HEALTHY DIETS FOR EMPLOYEES

An average of 12,100 people (37% of our workforce) in the Gold Division and 1,756 people (15% of our workforce) in the Platinum Division are provided with four meals and a mid-shift snack daily.

In addition to achieving the Mining Charter's nutritional guideline targets in both divisions, we have also standardised the menus and recalibrated portion sizes in all hostels to ensure nutritional value and contain costs.

The feeding scheme takes into account the dietary requirements of chronic diseases, such as hypertension, and omits salt from certain meals.



The variance between the individual platinum operations will be investigated to identify opportunities to further reduce exposures. The introduction of customised hearing-protection devices for high-risk occupations is supported and is currently being rolled out.

The high submission rates of NIHL occur despite compliance with the new occupational exposure limit of less than 107dB (A), introduction of the noise clipper coach programme and ensuring high-risk employees are correctly fitted with hearing-protection devices. Sibanye aims to fit all high-risk employees with customised hearing-protection devices which will include basic education on the harmful effects of noise, the responsibility of each employee and product orientation.

Occupational diseases – no. of cases reported

	2016		2015	2014	
	Group	Platinum Division	Gold Division	Gold Division	
Silicosis ¹	240	89	151	186	264
Chronic obstructive airways disease ²	46	16	30	57	45
Noise-induced hearing loss ³	188	62	126	105	138

¹ Exposure to free silica (SiO₂), also known as crystalline quartz, found across a broad range of industries, including mining, cement manufacturing and quarrying, reaches the small airways of the lungs and forms tiny nodules (pulmonary fibroses), resulting in silicosis

² Chronic obstructive airways disease (COAD) is characterised by chronically poor airflow, resulting in shortness of breath, coughing and sputum production. Long-term exposure to smoking, and particulates associated with air pollution as well as genetic predisposition, cause an inflammatory response in the lungs, resulting in a narrowing of the small airways and breakdown of lung tissue, known as emphysema or chronic bronchitis

³ Diagnosis of noise-induced hearing loss (NIHL) is made on assessment of the percentage hearing loss from baseline audiograms with NIHL defined as loss of hearing in excess of 10% that has manifest over a prolonged period after repeated exposure to noise levels in excess of 85dBA

As a member of the mining industry's Gold Working Group occupational lung disease initiative, Sibanye participated in a project with the Department of Health, the Medical Bureau for Occupational Diseases and the Compensation Commission for Occupational Diseases to address the backlog in claims for occupational lung disease. Sibanye has committed financial and occupational medical practitioner resources to this project, which is yielding promising results with more than 18,251 certifications having been processed in 2016, and 4,356 current and former mineworkers receiving compensation.

TRAUMA CARE

Partnerships with major trauma centres in the regions in which we operate continue to be developed. The Trauma Society of South Africa has assisted Sibanye in improving trauma care at each operation and in our host communities by auditing systems, healthcare providers and facilities.

HEALTH – FUTURE FOCUS

Further improvements in efficiencies in healthcare and the quality of care are planned by consolidating the efforts of funders and the alignment of providers. The platinum operations will be integrated along the principles of preventative healthcare and will include the establishment of shaft clinics to enhance the access and delivery of healthcare to all employees.

The number of medical schemes will be consolidated with the most beneficial options chosen and the current working partnership with the Department of Health enhanced for the benefit of the community at large. Cost efficiencies will be improved by eliminating duplication, and the delivery of healthcare and related outcomes in the communities in which we operate will improve.