

# MINERAL RESOURCE AND RESERVE STATEMENT

Resources and reserves reflected in this statement are reported on a Northam attributable basis, and include those which are either from properties that are wholly owned by Northam or its wholly owned subsidiaries, or joint venture properties in which Northam holds a stake.

Mineral resources are reported and are inclusive of mineral reserves.

## SCOPE OF REPORTING

Resources and reserves reflected in this statement include those from the following properties:

**Zondereinde**, the company's wholly-owned platinum group metal (PGM) mine, located in the Thabazimbi area of the Limpopo province and within the northern portion of the western limb of the Bushveld Complex. This includes both the Zondereinde and the Middeldrift portions of the property;

**Booysendal**, 100% owned by Northam's wholly-owned subsidiary, Micawber 278 Proprietary Limited (Micawber) and situated in the southern portion of the eastern limb of the Bushveld Complex;

**Dwaalkop**, located in the northern portion of the eastern limb of the Bushveld Complex, and in which Northam holds a 50% stake through its wholly-owned subsidiary Mvelaphanda Resources. Dwaalkop is managed by Lonmin plc (Lonmin);

**Pandora**, located in the Brits area of North West province and within the southern portion of the western limb of the Bushveld Complex, and in which Northam holds a 7.5% stake. Pandora is managed by Lonmin.

## KEY POINTS AND SIGNIFICANT REVISIONS FROM LAST YEAR

A decrease in the indicated Normal Merensky reef resource at Zondereinde, owing to reinterpretation of the regional transition location in the east of the property. This follows new drilling in the area.

A 30% increase in the Pandora resource, following a drilling programme conducted in 2011.

## REGULATORY COMPLIANCE

The mineral resource and mineral reserve statements for Northam Platinum Limited have been prepared under the guidance of the company's Lead Competent Persons who are duly registered with the South African Council for Professional and Technical Surveyors (PLATO) and/or with the South African Council for Natural Scientific Professions (SACNASP). This ensures that the mineral resource and mineral reserve statements comply with the provisions of the South African Code for Reporting of Mineral Resources and Mineral Reserves of 2007, revised in 2009 (SAMREC 2009). The company's competent persons have taken cognisance of definitions included in the code. The mineral resource and mineral reserve quantities reported here are considered to be fully compliant in all material respects with the requirements of the code, and the lead competent persons have given written confirmation of such.

Definitions of the various mineral resource and mineral reserve categories as well as the requirements for reporting of exploration results may be found at:

[www.samcode.co.za/downloads/SAMREC2009.pdf](http://www.samcode.co.za/downloads/SAMREC2009.pdf).

## STATUS OF MINERAL RIGHTS

Resources reflected in this statement include those of the Zondereinde and Booysendal concessions which are wholly owned by Northam or its wholly-

owned subsidiaries. In addition, Northam holds a 7.5% stake in the Pandora joint venture and a 50% stake in the Dwaalkop joint venture, both of which are managed by Lonmin, through its subsidiaries, Eastern Platinum Limited, and Western Platinum Limited respectively.

Northam holds new order mining rights over both the Zondereinde and Booyseindal mines.

The Pandora mine operates under a new order mining right which was converted from an old order right in 2013.

The Dwaalkop joint venture holds a new order prospecting right over the Dwaalkop prospect. This right is subject to a renewal application. An application for a new order mining right was submitted in 2009 and is being processed.

Northam further holds eight new order prospecting rights over the Kokerboom prospect, granted in 2009. Kokerboom is an iron oxide copper gold and massive sulphide copper zinc exploration prospect covering some 1 000 000 hectares of the Northern Cape Province of the Republic of South Africa. A prospecting work programme is currently in progress and no resource or reserve has yet been estimated.

A summary of mineral rights held and managed by Northam is tabulated below:

| Property           | Type of right                | Status                                              |
|--------------------|------------------------------|-----------------------------------------------------|
| Zondereinde mine   | New order mining right       | Converted mining right                              |
| Booyseindal mine   | New order mining right       | Converted mining right                              |
| Pandora mine       | New order mining right       | Converted mining right                              |
| Dwaalkop prospect  | New order prospecting right  | Application for a new order mining right in process |
| Kokerboom prospect | New order prospecting rights | Eight new order prospecting rights granted          |

Prospecting and mining rights are held in good order, and Northam perceives no risk to its rights to continue prospecting for and mining of minerals over any of its properties.

## CONTINUING OPERATIONS

The company confirms that it is not aware of any legal or arbitration proceedings, either pending or threatened, which may have or have had a material effect on the financial position of the company and its subsidiaries.

Further to this, the risk management section on pages 56 to 59 of this report analyses potential risks which may impact the company's ability to continue its activities.

## ENVIRONMENTAL LIABILITIES

The company's environmental obligations are managed in terms of approved environmental management plans. Compliance with the plans is audited by independent external parties on a regular basis. Details of the environmental liabilities are contained in note 20 to the 2013 annual financial statements and details of the funding of the environmental liabilities are contained in notes 10 and 11 to the 2013 annual financial statements.

# MINERAL RESOURCE AND RESERVE STATEMENT CONTINUED

## GROUP RESOURCES AND RESERVES

The following tables summarise the mineral resources and reserves attributable to Northam for

both the current and previous year. Notes on the reporting criteria are pertinent, together with specific notes to this section.

### NORTHAM GROUP RESOURCE ESTIMATE (combined measured, indicated and inferred)

|              |                       | 3PGE + Au as at 30 June 2013 |             |               | 3PGE + Au as at 30 June 2012 |             |               |
|--------------|-----------------------|------------------------------|-------------|---------------|------------------------------|-------------|---------------|
| Reef         | Mine                  | Mt                           | g/t         | Moz           | Mt                           | g/t         | Moz           |
| Merensky     | Booyssendal North     | 164.90                       | 5.32        | 28.22         | 164.90                       | 5.32        | 28.22         |
|              | Booyssendal South     | 90.57                        | 3.54        | 10.32         | 90.57                        | 3.54        | 10.32         |
|              | Booyssendal UG2 Mine  | 0.00                         | 0.00        | 0.00          | 0.00                         | 0.00        | 0.00          |
|              | Dwaalkop <sup>1</sup> | 38.05                        | 2.98        | 3.64          | 38.05                        | 2.98        | 3.64          |
|              | Pandora <sup>1</sup>  | 0.00                         | 0.00        | 0.00          | 0.00                         | 0.00        | 0.00          |
|              | Zondereinde           | 169.09                       | 7.37        | 40.08         | 172.42                       | 7.39        | 40.96         |
| <b>Total</b> |                       | <b>462.61</b>                | <b>5.53</b> | <b>82.26</b>  | <b>465.93</b>                | <b>5.55</b> | <b>83.14</b>  |
| UG2          | Booyssendal North     | 328.77                       | 3.61        | 38.19         | 328.77                       | 3.61        | 38.19         |
|              | Booyssendal South     | 208.10                       | 3.10        | 20.74         | 208.10                       | 3.10        | 20.74         |
|              | Booyssendal UG2 Mine  | 40.75                        | 4.36        | 5.71          | 41.88                        | 4.34        | 5.85          |
|              | Dwaalkop <sup>1</sup> | 37.56                        | 4.35        | 5.25          | 37.56                        | 4.35        | 5.25          |
|              | Pandora <sup>1</sup>  | 14.25                        | 4.65        | 2.13          | 11.77                        | 4.29        | 1.62          |
|              | Zondereinde           | 248.35                       | 5.08        | 40.59         | 248.84                       | 5.09        | 40.72         |
| <b>Total</b> |                       | <b>877.78</b>                | <b>3.99</b> | <b>112.62</b> | <b>876.92</b>                | <b>3.99</b> | <b>112.37</b> |
| Combined     | Booyssendal North     | 493.67                       | 4.18        | 66.41         | 493.67                       | 4.18        | 66.41         |
|              | Booyssendal South     | 298.67                       | 3.23        | 31.06         | 298.67                       | 3.23        | 31.06         |
|              | Booyssendal UG2 Mine  | 40.75                        | 4.36        | 5.71          | 41.88                        | 4.34        | 5.85          |
|              | Dwaalkop <sup>1</sup> | 75.61                        | 3.66        | 8.90          | 75.61                        | 3.66        | 8.90          |
|              | Pandora <sup>1</sup>  | 14.25                        | 4.65        | 2.13          | 11.77                        | 4.29        | 1.62          |
|              | Zondereinde           | 417.45                       | 6.01        | 80.67         | 421.25                       | 6.03        | 81.67         |
| <b>Total</b> |                       | <b>1 340.38</b>              | <b>4.52</b> | <b>195.88</b> | <b>1 342.85</b>              | <b>4.53</b> | <b>195.51</b> |

<sup>1</sup> Current resources and reserves of Pandora and Dwaalkop are quoted as at 30 September 2012, while those of the previous year are at 30 September 2011.

## NORTHAM GROUP RESERVE ESTIMATE (combined proven and probable)

| 3PGE + Au as at 30 June 2013 |                       |               |             |              | 3PGE + Au as at 30 June 2012 |             |              |
|------------------------------|-----------------------|---------------|-------------|--------------|------------------------------|-------------|--------------|
| Reef                         | Mine                  | Mt            | g/t         | Moz          | Mt                           | g/t         | Moz          |
| Merensky                     | Booyssendal North     | 0.00          | 0.00        | 0.00         | 0.00                         | 0.00        | 0.00         |
|                              | Booyssendal South     | 0.00          | 0.00        | 0.00         | 0.00                         | 0.00        | 0.00         |
|                              | Booyssendal UG2 Mine  | 0.00          | 0.00        | 0.00         | 0.00                         | 0.00        | 0.00         |
|                              | Dwaalkop <sup>1</sup> | 13.66         | 2.61        | 1.15         | 13.66                        | 2.61        | 1.15         |
|                              | Pandora <sup>1</sup>  | 0.00          | 0.00        | 0.00         | 0.00                         | 0.00        | 0.00         |
|                              | Zondereinde           | 12.80         | 5.84        | 2.40         | 16.24                        | 5.66        | 2.96         |
| <b>Total</b>                 |                       | <b>26.46</b>  | <b>4.17</b> | <b>3.55</b>  | <b>29.90</b>                 | <b>4.27</b> | <b>4.10</b>  |
| UG2                          | Booyssendal North     | 0.00          | 0.00        | 0.00         | 0.00                         | 0.00        | 0.00         |
|                              | Booyssendal South     | 0.00          | 0.00        | 0.00         | 0.00                         | 0.00        | 0.00         |
|                              | Booyssendal UG2 Mine  | 33.27         | 2.96        | 3.17         | 34.06                        | 2.95        | 3.23         |
|                              | Dwaalkop <sup>1</sup> | 16.10         | 3.30        | 1.71         | 16.10                        | 3.30        | 1.71         |
|                              | Pandora <sup>1</sup>  | 1.36          | 4.02        | 0.18         | 1.09                         | 4.14        | 0.14         |
|                              | Zondereinde           | 34.24         | 4.39        | 4.83         | 34.48                        | 4.30        | 4.77         |
| <b>Total</b>                 |                       | <b>84.97</b>  | <b>3.62</b> | <b>9.88</b>  | <b>85.73</b>                 | <b>3.57</b> | <b>9.85</b>  |
| Combined                     | Booyssendal North     | 0.00          | 0.00        | 0.00         | 0.00                         | 0.00        | 0.00         |
|                              | Booyssendal South     | 0.00          | 0.00        | 0.00         | 0.00                         | 0.00        | 0.00         |
|                              | Booyssendal UG2 Mine  | 33.27         | 2.96        | 3.17         | 34.06                        | 2.95        | 3.23         |
|                              | Dwaalkop <sup>1</sup> | 29.76         | 2.98        | 2.85         | 29.76                        | 2.98        | 2.85         |
|                              | Pandora <sup>1</sup>  | 1.36          | 4.02        | 0.18         | 1.09                         | 4.14        | 0.14         |
|                              | Zondereinde           | 47.04         | 4.78        | 7.23         | 50.72                        | 4.74        | 7.72         |
| <b>Total</b>                 |                       | <b>111.42</b> | <b>3.75</b> | <b>13.43</b> | <b>115.62</b>                | <b>3.75</b> | <b>13.95</b> |

<sup>1</sup> Current resources and reserves of Pandora and Dwaalkop are quoted as at 30 September 2012, while those of the previous year are at 30 September 2011.

Breakdowns of the mineral resources and reserves into their respective confidence categories may be found in the sections specific to the concessions.

### COMPETENT PERSONS

The resource and reserve statement for the Zondereinde and Middeldrift portions of Zondereinde mine were compiled by Charl van Jaarsveld, BSc (Hons) Geology, Pr.Sci.Nat. (400268/05), chief geologist at the Zondereinde mine with 10 years' experience relevant to Bushveld-related resource and reserve estimation.

The Booyssendal resource statement was compiled by Meschak Mqadi; BSc (Hons) Geology, Pr.Sci.Nat. (MGSSA 966985), chief geologist at Booyssendal UG2 North mine with five years' experience relevant to precious metal related resource estimation.

The Booyssendal reserve statement was compiled by Willie Theron, BSc (Hons) Mining, Pr. Cert Eng, ECSA (200790030), Manager: Mining at Booyssendal UG2 North mine with 17 years' experience of Bushveld-related underground mining and reserve estimation.

Resource and reserve estimates for both Zondereinde and Booyssendal were reviewed by Damian Smith, BSc (Hons) Geology, MSc, Pr.Sci. Nat. (400323/04), principal member of Prospect Geoservices with 23 years' experience in mining and exploration geology, 17 years of which are relevant to Bushveld-related resource and reserve estimation.

The resource and reserve estimates for the Pandora joint venture were prepared by a team from both Anglo Platinum and Lonmin. Resources were signed off by Jeremy Witley (Lonmin) and Paul Stevenson (Anglo Platinum), whilst reserves were signed off by Jonathan Hudson (Lonmin).

The resource and reserve estimates for the Dwaalkop joint venture were prepared by a team from Snowden Mining Industry Consultants (Resources) and from AMC Consulting (Pty) Limited (Reserves). Resources were signed off by Jeremy Witley (Lonmin), whilst reserves were signed off by Jonathan Hudson (Lonmin).

Contact details for Northam's lead competent persons authorising publication of the resource estimates are contained within the notes on reporting criteria within this report.

### GEOLOGICAL SETTING – THE BUSHVELD COMPLEX

The 2 billion year old Bushveld Complex is the largest layered igneous complex in the world, and is the repository for around 85% of known global PGM resources. Extending over an area of some 67 000km<sup>2</sup> within the north-eastern portion of the Republic of South Africa, it contains the intrusive, mafic-ultramafic Rustenburg Layered Suite (RLS), which outcrops as three main acicular limbs, namely the western, eastern and northern limbs (see figure on page 32), and ranges in thickness from 7km to 12km.

The magmatic layering in the RLS is laterally persistent and can be correlated throughout most of the complex. Layering is generally shallow dipping towards the centre of the complex. The RLS stratigraphy is sub-divided into five zones, which are, from lowest to highest; the marginal zone, the lower zone, the critical zone (which is further subdivided into a lower and upper unit), the main zone and the upper zone.

PGM and associated precious and base metal mineralisation is hosted in or adjacent to chromitite

seams located within the upper critical zone of the RLS. There are two significant ore bodies from which 75% of global primary PGM production is derived, these being the UG2 and Merensky reefs. The vertical separation between the UG2 and Merensky reefs is variable across the Bushveld Complex, ranging from 20m to 140m on the western limb and between 170m and 400m on the eastern limb.

Historically, PGM production was concentrated on the western limb, but in recent years the eastern limb has been the focus of new mine development.

The two wholly-owned Northam properties, the Zondereinde and Booyssendal mines contain resources of both the UG2 and Merensky reefs.

## ZONDEREINDE MINE

Zondereinde mine is situated in the northern portion of the western limb of the Bushveld Complex, approximately 30km south of the town of Thabazimbi in the Limpopo province of the Republic of South Africa. The mining concession covers some 7 625 hectares underlain by both the Merensky and UG2 ore bodies, which dip at approximately 20° and extend from a depth of 1 100 metres below surface to 2 900 metres below surface.

The company exploits both the Merensky and UG2 reefs of the upper critical zone of the Bushveld Complex. While there is lateral continuity of both reefs across the mine property, the Merensky reef displays a variety of reef types. The distribution of these is determined from a combination of surface exploration boreholes, ongoing prospect drilling from underground development, and reef mapping in development and stoping. In contrast to the Merensky Reef, the UG2 displays little variation in reef attributes.

The Bushveld sequence at Zondereinde is typical of the northern portion of the western limb. The critical zone stratigraphy is telescoped and dominated by mafic lithologies. Vertical separation between the UG2 and Merensky reefs is in the range of 20m to 40m.

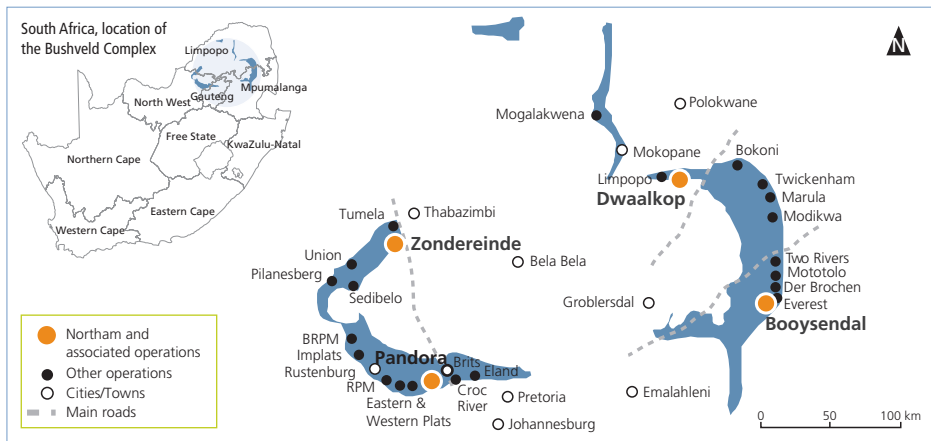
Combined geological and extraction losses were discounted from the resources for both reefs. These comprised pothole and structural losses as well as other pillar losses. Discount losses vary per Merensky reef type and resource category, but average at 26% for Merensky reef and 48% for UG2.

## History and mining activities

Development of Zondereinde mine started in 1986, following a five year exploration programme. Mining of ore, commissioning of a PGM concentrator, smelter and base metal removal plant and the sale of first PGMs came in 1993. The mine originally exploited only the Merensky reef resource, but the commissioning of a UG2 concentrator in 2000, together with the necessary underground ore handling systems, allowed mining and processing of UG2. The mine produces approximately 2 000 000 tonnes of ore per annum, generating in the order of 300 000oz of 3PGE+Au in final concentrate together with associated precious and base metal by-products.

Underground mining focuses on the exploitation of PGM ores by means of traditional narrow tabular reef drill and blast mining methods. A standard breast mining layout is used at Northam. The vertical interval (distance) between levels is 63 metres. With the orebody dipping at 20°, this provides a raise length of 180 metres allowing for six panels of 30 metres each per raise connection. Strike gullies are inclined at 10° above the strike direction. A dip gully handles the ore transported via the

## BUSHVELD LOCATION PLAN INDICATING CURRENT PGM MINING OPERATIONS



strike gullies to three orepasses situated in the original raise, all of which are fitted with radial-door control chutes. Ore is transported to the main shaft ore passes by battery powered locomotives (locos) pulling spans of eight hoppers. Broken ore is transported to a conventional shaft ore-pass system, with separate rock handling facilities for Merensky reef, UG2 reef and waste.

Mining is successfully conducted using hydropowered equipment such as rock drills and high pressure water-jets in conjunction with electric scraper winches.

The underground workings are accessed from a twin shaft system. No 1 shaft extends to 13 level (2 039 metres below surface) and No 2 shaft serves workings down to 8 level (1 724 metres below surface). The shafts are 90 metres apart and are interconnected at an intermediate pump chamber

(IPC) at 1 019 metres below surface, and also on levels 4, 6, 7, 8 and 9. Workings below 13 level are serviced by a decline access way, designed to accommodate both people and materials, and equipped with a conveyor belt system that transports the broken rock.

## Merensky reef

The Merensky reef is a zone of mineralisation which straddles the base of the Merensky cyclic unit. In the area of Zondereinde mine the Merensky reef consists of two sub-facies of the Zwartklip facies of the RLS, namely the normal and regional pothole sub-facies. The latter may be further subdivided into three reef types, each of which occurs at a specific stratigraphic level below that of the normal reef sub-facies. These being NP2 and P2, which constitute the main sources of ore, and FWP2 which, whilst not considered a primary mining target due to the undulating nature of this reef type, is successfully exploited in the south

western quadrant of the current mining area where it displays lesser disruption.

The stoping cut on the Merensky reef is dependent upon the reef type mined, and the geozone in which it is located. In all stoping cuts, the Merensky chromitite is exposed with a minimum of 10cm of the overlying mineralised Merensky pyroxenite as hanging wall.

The measured resource is an estimate of the *in situ* tonnage, grade and 4E PGM ounces that have been exposed through development and are immediately available for mining. The Merensky measured resource has increased from 2.41Mt (631 000oz) in June 2012 to 2.79Mt (740 000oz) in June 2013. This is the result of an increase to the exposed Merensky resource, combined with the application of a higher

resource grade owing to a higher proportion of high grade P2 reef in the north western portions of the resource block.

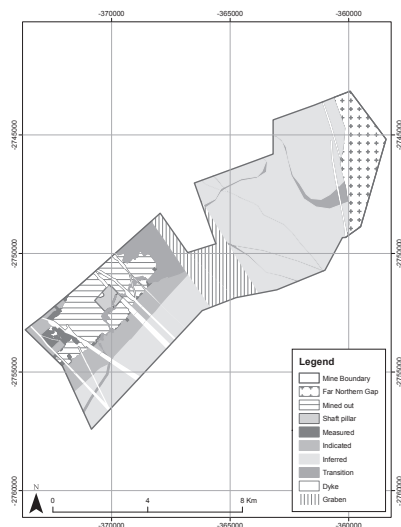
The Merensky indicated and inferred resources have declined as a result of a lower normal Merensky reef contribution, which dominates the deeper portions of Zondereinde mine within the indicated and inferred resource categories. This is a consequence of a down-dip reinterpretation of the regional transition from normal to regional pothole sub-facies in the eastern portion of the mine, following new drilling in this area.

### UG2 reef

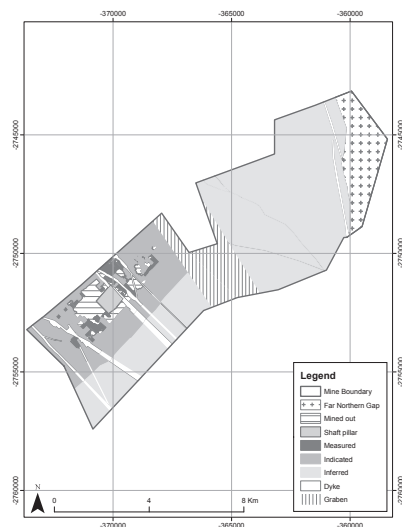
The UG2 reef at Zondereinde mine is remarkably conformable when compared with the Merensky reef. Disruption, in the form of potholes and reef

## ZONDEREINDE RESOURCES AND RESERVES

### Zondereinde Merensky resource classification 2013



### Zondereinde UG2 resource classification 2013



## MINERAL RESOURCE AND RESERVE STATEMENT CONTINUED

rolls, is extremely limited and localised. The reef consists of three chromitite seams separated by narrow pyroxenite partings. The lower seam, termed the main member, is generally in the order of 85cm thick, and is overlain by two leader seams, each in the order of 15cm thick. Total reef thickness, inclusive of a portion of mineralized reef footwall, is in the order of 150cm to 160cm. There is no basis for subdividing the UG2 reef into facies types.

Historically, UG2 mining has been limited to de-stressed areas underlying previously mined Merensky reef. Furthermore, a full reef cut is mined, which enhances metal output, hanging wall stability and safe working practices.

The measured resource is an estimate of the *in situ* tonnage, grade and PGM ounces that have been exposed through development and are immediately available for mining. The UG2 measured resource has increased from 3.82Mt (622 000oz) in June 2012 to 4.52Mt (730 000oz) in June 2013. This is the result of an increase in exposed UG2 resource and is in line with mining depletion and planned development of the UG2 reef, partially offset by a marginally reduced resource grade due to the application of a wider channel. The UG2 indicated resource has declined in line with mining depletion. The UG2 inferred resource is essentially unchanged.

### ZONDEREINDE RESOURCE ESTIMATE

| 3PGE + Au as at 30 June 2013 |              |               |             |              | 3PGE + Au as at 30 June 2012 |             |              |
|------------------------------|--------------|---------------|-------------|--------------|------------------------------|-------------|--------------|
| Reef                         | Category     | Mt            | g/t         | Moz          | Mt                           | g/t         | Moz          |
| Merensky                     | Measured     | 2.79          | 8.29        | 0.74         | 2.41                         | 8.15        | 0.63         |
|                              | Indicated    | 19.76         | 7.09        | 4.50         | 23.29                        | 7.13        | 5.34         |
|                              | Inferred     | 146.54        | 7.39        | 34.83        | 146.72                       | 7.42        | 34.99        |
|                              | <b>Total</b> | <b>169.09</b> | <b>7.37</b> | <b>40.08</b> | <b>172.42</b>                | <b>7.39</b> | <b>40.96</b> |
| UG2                          | Measured     | 4.52          | 5.04        | 0.73         | 3.82                         | 5.06        | 0.62         |
|                              | Indicated    | 36.64         | 5.04        | 5.94         | 37.78                        | 5.06        | 6.15         |
|                              | Inferred     | 207.20        | 5.09        | 33.92        | 207.23                       | 5.09        | 33.95        |
|                              | <b>Total</b> | <b>248.35</b> | <b>5.08</b> | <b>40.59</b> | <b>248.84</b>                | <b>5.09</b> | <b>40.72</b> |
| Combined                     | Measured     | 7.31          | 6.28        | 1.48         | 6.23                         | 6.26        | 1.25         |
|                              | Indicated    | 56.40         | 5.76        | 10.44        | 61.07                        | 5.85        | 11.49        |
|                              | Inferred     | 353.74        | 6.05        | 68.75        | 353.95                       | 6.06        | 68.93        |
|                              | <b>Total</b> | <b>417.45</b> | <b>6.01</b> | <b>80.67</b> | <b>421.25</b>                | <b>6.03</b> | <b>81.67</b> |

## ZONDEREINDE RESERVE ESTIMATE

| 3PGE + Au as at 30 June 2013 |              |              |             |             | 3PGE + Au as at 30 June 2012 |             |             |
|------------------------------|--------------|--------------|-------------|-------------|------------------------------|-------------|-------------|
| Reef                         | Category     | Mt           | g/t         | Moz         | Mt                           | g/t         | Moz         |
| Merensky                     | Proven       | 3.29         | 6.14        | 0.65        | 2.94                         | 5.96        | 0.56        |
|                              | Probable     | 9.51         | 5.73        | 1.75        | 13.30                        | 5.59        | 2.39        |
|                              | <b>Total</b> | <b>12.80</b> | <b>5.84</b> | <b>2.40</b> | <b>16.24</b>                 | <b>5.66</b> | <b>2.96</b> |
| UG2                          | Proven       | 4.78         | 4.39        | 0.67        | 4.02                         | 4.30        | 0.56        |
|                              | Probable     | 29.49        | 4.39        | 4.16        | 30.46                        | 4.30        | 4.21        |
|                              | <b>Total</b> | <b>34.24</b> | <b>4.39</b> | <b>4.83</b> | <b>34.48</b>                 | <b>4.30</b> | <b>4.77</b> |
| Combined                     | Proven       | 8.07         | 5.10        | 1.32        | 6.69                         | 5.00        | 1.12        |
|                              | Probable     | 38.97        | 4.72        | 5.91        | 43.76                        | 4.69        | 6.61        |
|                              | <b>Total</b> | <b>47.04</b> | <b>4.78</b> | <b>7.23</b> | <b>50.72</b>                 | <b>4.74</b> | <b>7.72</b> |

|              |      |      |      |     | % metal content                |       |       |
|--------------|------|------|------|-----|--------------------------------|-------|-------|
| Prill splits | Pt   | Pd   | Rh   | Au  | Cr <sub>2</sub> O <sub>3</sub> | Cu    | Ni    |
| UG2          | 57.7 | 30.9 | 10.3 | 1.0 | 27.6                           | 0.021 | 0.123 |
| Merensky     | 63.0 | 29.2 | 5.2  | 2.6 | 0.8                            | 0.072 | 0.164 |

## BOOYSENDAL MINE

The Booyssendal concession is located in the southern compartment of the eastern limb of the Bushveld Complex, approximately 35km west of the town of Mashishing (formerly Lydenburg), straddling the border of Limpopo and Mpumalanga provinces in the Republic of South Africa.

The concession covers some 15 151 hectares and hosts both the UG2 and Merensky ore bodies, which outcrop over a strike length of 14.5km and dip at approximately 10° to the west.

The resource estimate is informed by exploration data, together with channel sampling from on-reef development within the UG2 North mine. 90% of

the exploration drilling was conducted within 2.5km down-dip of outcrop. Drill hole spacing in this near outcrop area ranges from 150m to 400m. Channel samples are located at 15m intervals within on-reef development and stoping.

A study to determine the feasibility of mining UG2 and Merensky reefs within the northern most 8km of Booyssendal strike, over a dip extent from outcrop of approximately 2km, was completed in September 2009. Development of a UG2 mine (UG2 North mine) in the northernmost 4km of strike started in May 2010.

In May 2011, Northam concluded an agreement to dispose of mineral rights within the southern section of the Booyssendal concession, comprising

some 6 620 hectares. The transaction required the fulfilment or waiver of various conditions precedent, including, among others, a section 102 consent by the Minister of Mineral Resources. The agreement lapsed at the end of April 2013 through the expiry of time without the section 102 approval having been obtained.

In light of these developments, the resource estimate for the Booyssendal concession is subdivided into three sections, these being the southern section of Booyssendal subject, which was subject to a sale transaction (Booyssendal South); the UG2 North mine; and the remainder of the northern section of the concession (Booyssendal North). A mineral reserve estimate is presented for the UG2 North mine only.

The Bushveld sequence at Booyssendal is similar to that found across the southern compartment of the eastern limb. The critical zone stratigraphy is fully developed and middling between the UG2 and Merensky reefs is in the order of 175m in the northern portion of Booyssendal. The sequence is, however subject to thinning in the southern portion, which is linked to the Bushveld rocks abutting basement highs. The impact of this 'abutment' is further manifested in disruption to surface morphology and internal structure of the two reefs. This has led to the characterisation of three geozones within the Booyssendal concession, these being the normal, slump and abutment geozones. Despite this progressive disruption to the south, the continuity of the reef surfaces is robust across the property.

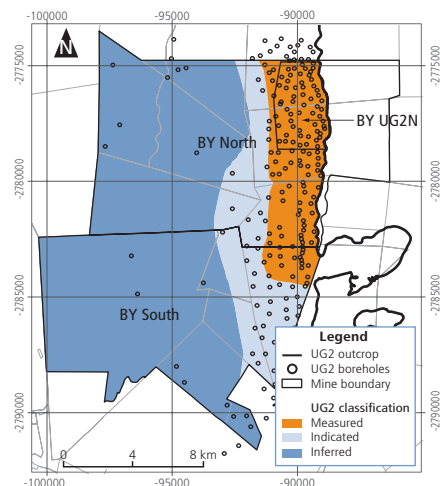
The internal structure of the UG2 reef is similar to that found on the Bushveld western limb, whilst the Merensky reef is typical of the northern portion of the Bushveld eastern limb.

The UG2 reef consists of an upper leader chromitite and a lower main chromitite with a combined thickness of some 140cm. These seams are generally juxtaposed or merged, but can display variable internal silicate partings.

The Merensky reef is the upper mineralized portion of the Merensky pyroxenite, generally extending over 110cm. The Merensky reef is immediately overlain by a sequence of competent norites.

Resources were estimated over the reef channels. For the UG2 reef, the reef channel extends from the top of the leader chromitite to the base of the main chromitite seam. For the Merensky reef, the reef channel extends from the top of the Merensky pyroxenite to a sample grade cut off of 1g/t, with a minimum mining channel width of 80cm applied.

## BOOYSSENDAL RESOURCES AND RESERVES UG2 resource classes



Geological losses were discounted from the resources for both reefs. These comprised pothole and structural losses. In the north and UG2 North mine sections of the concession, geological losses amounted to 24% and 23% for the UG2 and Merensky reefs respectively. In the south section of the concession, geological losses of 30% and 23% were applied respectively. Furthermore, a channel cut-off 4E grade of 2.5g/t was applied to estimated blocks in all three sections. In addition, a 30m thick surface oxidized zone was discounted along the lines of outcrop of both reefs.

Resource categorisation was based upon a combination of quantitative geostatistical parameters, together with a qualitative appreciation of orebody continuity informed by

the resource database together with data from surrounding properties.

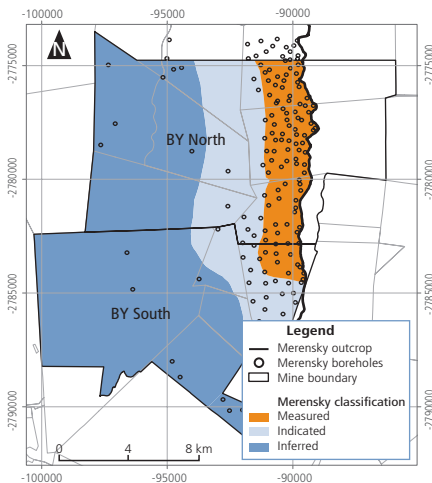
## MINE DESIGN AND MINING ACTIVITIES

The UG2 North mine is an underground, mechanised bord and pillar mine, accessed from surface via a ramp decline system, comprising three declines on the plane of reef and one decline situated 20m into the footwall of the reef, containing a belt for ore handling.

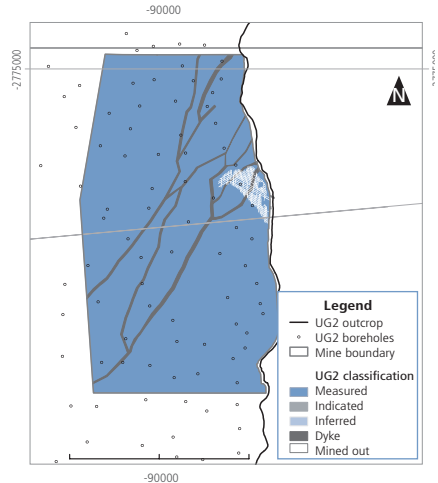
Mining sections extend over a dip length of 144m, equating to a vertical interval of 25m. Strike drives are inclined at 5° above the line of strike, strike belts within the drives will transport ore to the central decline system, tipping through an ore pass system to the footwall belt for transport to a UG2

## BOOYSENDAL RESOURCES AND RESERVES

### Merensky resource classes



### Booyensdal UG2 North mine UG2 resource classes



## MINERAL RESOURCE AND RESERVE STATEMENT CONTINUED

concentrator plant on surface. Mechanised boom rigs and LHDs are employed in mining and development.

The mine is planned with a life of 25 years, to produce 2 250 000 tonnes of ore per annum at steady state, generating in the order of 160 000oz of metals in concentrate (3PGE+Au), together with associated precious and base metal by-products.

It is in build-up phase and is expected to reach steady state in 2016.

### BOOYSENDAL RESOURCES AND RESERVES

The UG2 measured resource for the UG2 North mine has decreased from 41.88Mt (5.85Moz) in June 2012 to 40.75Mt (5.71Moz) in June 2013, as a result of mining depletion.

#### BOOYSENDAL UG2 NORTH MINE RESOURCE ESTIMATE

|          |              | 3PGE + Au as at 30 June 2013 |             |             | 3PGE + Au as at 30 June 2012 |             |             |
|----------|--------------|------------------------------|-------------|-------------|------------------------------|-------------|-------------|
| Reef     | Category     | Mt                           | g/t         | Moz         | Mt                           | g/t         | Moz         |
| Merensky | Measured     | 0.00                         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|          | Indicated    | 0.00                         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|          | Inferred     | 0.00                         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|          | <b>Total</b> | <b>0.00</b>                  | <b>0.00</b> | <b>0.00</b> | <b>0.00</b>                  | <b>0.00</b> | <b>0.00</b> |
| UG2      | Measured     | 40.75                        | 4.36        | 5.71        | 41.88                        | 4.34        | 5.85        |
|          | Indicated    | 0.00                         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|          | Inferred     | 0.00                         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|          | <b>Total</b> | <b>40.85</b>                 | <b>4.36</b> | <b>5.71</b> | <b>41.88</b>                 | <b>4.34</b> | <b>5.85</b> |
| Combined | Measured     | 40.75                        | 4.36        | 5.71        | 41.88                        | 4.34        | 5.85        |
|          | Indicated    | 0.00                         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|          | Inferred     | 0.00                         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|          | <b>Total</b> | <b>40.75</b>                 | <b>4.36</b> | <b>5.71</b> | <b>41.88</b>                 | <b>4.34</b> | <b>5.85</b> |

## BOOYSENDAL UG2 NORTH MINE RESERVE ESTIMATE

| 3PGE + Au as at 30 June 2013 |              |              |             |             | 3PGE + Au as at 30 June 2012 |             |             |
|------------------------------|--------------|--------------|-------------|-------------|------------------------------|-------------|-------------|
| Reef                         | Category     | Mt           | g/t         | Moz         | Mt                           | g/t         | Moz         |
| Merensky                     | Proven       | 0.00         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|                              | Probable     | 0.00         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|                              | <b>Total</b> | <b>0.00</b>  | <b>0.00</b> | <b>0.00</b> | <b>0.00</b>                  | <b>0.00</b> | <b>0.00</b> |
| UG2                          | Proven       | 33.27        | 2.96        | 3.17        | 34.06                        | 2.95        | 3.23        |
|                              | Probable     | 0.00         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|                              | <b>Total</b> | <b>33.27</b> | <b>2.96</b> | <b>3.17</b> | <b>34.06</b>                 | <b>2.95</b> | <b>3.23</b> |
| Combined                     | Proven       | 33.27        | 2.96        | 3.17        | 34.06                        | 2.95        | 3.23        |
|                              | Probable     | 0.00         | 0.00        | 0.00        | 0.00                         | 0.00        | 0.00        |
|                              | <b>Total</b> | <b>33.27</b> | <b>2.96</b> | <b>3.17</b> | <b>34.06</b>                 | <b>2.95</b> | <b>3.23</b> |

|              |      |      |     |     | % metal content                |       |       |
|--------------|------|------|-----|-----|--------------------------------|-------|-------|
| Prill splits | Pt   | Pd   | Rh  | Au  | Cr <sub>2</sub> O <sub>3</sub> | Cu    | Ni    |
| UG2          | 57.2 | 32.6 | 9.3 | 0.9 | 24.9                           | 0.008 | 0.085 |
| Merensky     | —    | —    | —   | —   | —                              | —     | —     |

All categories of the Merensky and UG2 resources for Booysendal North and South are unchanged from the previous reporting period.

# MINERAL RESOURCE AND RESERVE STATEMENT CONTINUED

## BOOYSENDAL NORTH RESOURCE ESTIMATE

| 3PGE + Au as at 30 June 2013 |           |               |             |              | 3PGE + Au as at 30 June 2012 |             |              |
|------------------------------|-----------|---------------|-------------|--------------|------------------------------|-------------|--------------|
| Reef                         | Category  | Mt            | g/t         | Moz          | Mt                           | g/t         | Moz          |
| Merensky                     | Measured  | 33.30         | 5.37        | 5.75         | 33.30                        | 5.37        | 5.75         |
|                              | Indicated | 46.34         | 5.43        | 8.08         | 46.34                        | 5.43        | 8.08         |
|                              | Inferred  | 85.26         | 5.25        | 14.39        | 85.26                        | 5.25        | 14.39        |
| <b>Total</b>                 |           | <b>164.90</b> | <b>5.32</b> | <b>28.22</b> | <b>164.90</b>                | <b>5.32</b> | <b>28.22</b> |
| UG2                          | Measured  | 51.73         | 3.88        | 6.45         | 51.73                        | 3.88        | 6.45         |
|                              | Indicated | 46.23         | 4.66        | 6.92         | 46.23                        | 4.66        | 6.92         |
|                              | Inferred  | 230.81        | 3.34        | 24.82        | 230.81                       | 3.34        | 24.82        |
| <b>Total</b>                 |           | <b>328.77</b> | <b>3.61</b> | <b>38.19</b> | <b>328.77</b>                | <b>3.61</b> | <b>38.19</b> |
| Combined                     | Measured  | 85.03         | 4.46        | 12.20        | 85.03                        | 4.46        | 12.20        |
|                              | Indicated | 92.57         | 5.04        | 15.00        | 92.57                        | 5.04        | 15.00        |
|                              | Inferred  | 316.07        | 3.86        | 39.21        | 316.07                       | 3.86        | 29.21        |
| <b>Total</b>                 |           | <b>493.67</b> | <b>4.18</b> | <b>66.41</b> | <b>493.67</b>                | <b>4.18</b> | <b>66.41</b> |

|              |      |      |     |     | % metal content                |       |       |
|--------------|------|------|-----|-----|--------------------------------|-------|-------|
| Prill splits | Pt   | Pd   | Rh  | Au  | Cr <sub>2</sub> O <sub>3</sub> | Cu    | Ni    |
| UG2          | 56.9 | 33.7 | 8.5 | 0.8 | 26.7                           | 0.007 | 0.075 |
| Merensky     | 59.0 | 31.0 | 2.4 | 7.7 | 0.8                            | 0.141 | 0.301 |

## BOOYSENDAL SOUTH RESOURCE ESTIMATE

| 3PGE + Au as at 30 June 2013 |           |               |             |              | 3PGE + Au as at 30 June 2012 |             |              |
|------------------------------|-----------|---------------|-------------|--------------|------------------------------|-------------|--------------|
| Reef                         | Category  | Mt            | g/t         | Moz          | Mt                           | g/t         | Moz          |
| Merensky                     | Measured  | 3.80          | 2.46        | 0.30         | 3.80                         | 2.46        | 0.30         |
|                              | Indicated | 15.79         | 3.15        | 1.62         | 15.79                        | 3.15        | 1.62         |
|                              | Inferred  | 70.80         | 3.69        | 8.40         | 70.80                        | 3.69        | 8.40         |
| <b>Total</b>                 |           | <b>90.57</b>  | <b>3.54</b> | <b>10.32</b> | <b>90.57</b>                 | <b>3.54</b> | <b>10.32</b> |
| UG2                          | Measured  | 14.60         | 3.41        | 1.60         | 14.60                        | 3.41        | 1.60         |
|                              | Indicated | 52.90         | 3.43        | 5.84         | 52.90                        | 3.43        | 5.84         |
|                              | Inferred  | 140.60        | 2.94        | 13.30        | 140.60                       | 2.94        | 13.30        |
| <b>Total</b>                 |           | <b>208.10</b> | <b>3.10</b> | <b>20.74</b> | <b>208.10</b>                | <b>3.10</b> | <b>20.74</b> |
| Combined                     | Measured  | 18.40         | 3.21        | 1.90         | 18.40                        | 3.21        | 1.90         |
|                              | Indicated | 68.87         | 3.37        | 7.46         | 68.87                        | 3.37        | 7.46         |
|                              | Inferred  | 211.40        | 3.19        | 21.70        | 211.40                       | 3.19        | 21.70        |
| <b>Total</b>                 |           | <b>298.67</b> | <b>3.23</b> | <b>31.06</b> | <b>298.67</b>                | <b>3.23</b> | <b>31.06</b> |

|              |      |      |     |     | % metal content                |       |       |
|--------------|------|------|-----|-----|--------------------------------|-------|-------|
| Prill splits | Pt   | Pd   | Rh  | Au  | Cr <sub>2</sub> O <sub>3</sub> | Cu    | Ni    |
| UG2          | 60.6 | 28.6 | 9.5 | 1.2 | 26.0                           | 0.010 | 0.071 |
| Merensky     | 57.1 | 33.1 | 2.6 | 7.3 | 0.8                            | 0.096 | 0.221 |

# MINERAL RESOURCE AND RESERVE STATEMENT CONTINUED

## PANDORA RESOURCE ESTIMATE

| 3PGE + Au as at 30 September 2012 |              |              |             |             | 3PGE + Au as at 30 September 2011 |             |             |
|-----------------------------------|--------------|--------------|-------------|-------------|-----------------------------------|-------------|-------------|
| Reef                              | Category     | Mt           | g/t         | Moz         | Mt                                | g/t         | Moz         |
| Merensky                          | Measured     | 0.00         | 0.00        | 0.00        | 0.00                              | 0.00        | 0.00        |
|                                   | Indicated    | 0.00         | 0.00        | 0.00        | 0.00                              | 0.00        | 0.00        |
|                                   | Inferred     | 0.00         | 0.00        | 0.00        | 0.00                              | 0.00        | 0.00        |
|                                   | <b>Total</b> | <b>0.00</b>  | <b>0.00</b> | <b>0.00</b> | <b>0.00</b>                       | <b>0.00</b> | <b>0.00</b> |
| UG2                               | Measured     | 2.00         | 4.81        | 0.31        | 0.93                              | 4.84        | 0.14        |
|                                   | Indicated    | 10.52        | 4.61        | 1.56        | 3.42                              | 4.52        | 0.50        |
|                                   | Inferred     | 1.72         | 4.73        | 0.26        | 7.42                              | 4.12        | 0.98        |
|                                   | <b>Total</b> | <b>14.25</b> | <b>4.65</b> | <b>2.13</b> | <b>11.77</b>                      | <b>4.29</b> | <b>1.62</b> |
| Combined                          | Measured     | 2.00         | 4.81        | 0.31        | 0.93                              | 4.84        | 0.14        |
|                                   | Indicated    | 10.52        | 4.61        | 1.56        | 3.42                              | 4.52        | 0.50        |
|                                   | Inferred     | 1.72         | 4.73        | 0.26        | 7.42                              | 4.12        | 0.98        |
|                                   | <b>Total</b> | <b>14.25</b> | <b>4.65</b> | <b>2.13</b> | <b>11.77</b>                      | <b>4.29</b> | <b>1.62</b> |

## PANDORA RESERVE ESTIMATE

| 3PGE + Au as at 30 September 2012 |              |             |             |             | 4E PGM as at 30 September 2011 |             |             |
|-----------------------------------|--------------|-------------|-------------|-------------|--------------------------------|-------------|-------------|
| Reef                              | Category     | Mt          | g/t         | Moz         | Mt                             | g/t         | Moz         |
| Merensky                          | Proven       | 0.00        | 0.00        | 0.00        | 0.00                           | 0.00        | 0.00        |
|                                   | Probable     | 0.00        | 0.00        | 0.00        | 0.00                           | 0.00        | 0.00        |
|                                   | <b>Total</b> | <b>0.00</b> | <b>0.00</b> | <b>0.00</b> | <b>0.00</b>                    | <b>0.00</b> | <b>0.00</b> |
| UG2                               | Proven       | 0.11        | 4.30        | 0.01        | 0.08                           | 4.39        | 0.01        |
|                                   | Probable     | 1.25        | 4.00        | 0.16        | 1.01                           | 4.12        | 0.13        |
|                                   | <b>Total</b> | <b>1.36</b> | <b>4.02</b> | <b>0.18</b> | <b>1.09</b>                    | <b>4.14</b> | <b>0.14</b> |
| Combined                          | Proven       | 0.11        | 4.30        | 0.01        | 0.08                           | 4.39        | 0.01        |
|                                   | Probable     | 1.25        | 4.00        | 0.16        | 1.01                           | 4.12        | 0.13        |
|                                   | <b>Total</b> | <b>1.36</b> | <b>4.02</b> | <b>0.18</b> | <b>1.09</b>                    | <b>4.14</b> | <b>0.14</b> |

|              |      |      |      |     | % metal content                |       |       |
|--------------|------|------|------|-----|--------------------------------|-------|-------|
| Prill splits | Pt   | Pd   | Rh   | Au  | Cr <sub>2</sub> O <sub>3</sub> | Cu    | Ni    |
| UG2          | 60.5 | 28.0 | 11.1 | 0.4 | no data                        | 0.004 | 0.024 |
| Merensky     | —    | —    | —    | —   | —                              | —     | —     |

## DWAALKOP RESOURCE ESTIMATE

| 3PGE + Au as at 30 September 2012 |           |              |             |             | 3PGE + Au as at 30 September 2011 |             |             |
|-----------------------------------|-----------|--------------|-------------|-------------|-----------------------------------|-------------|-------------|
| Reef                              | Category  | Mt           | g/t         | Moz         | Mt                                | g/t         | Moz         |
| Merensky                          | Measured  | 0.00         | 0.00        | 0.00        | 0.00                              | 0.00        | 0.00        |
|                                   | Indicated | 21.83        | 2.89        | 2.03        | 21.83                             | 2.89        | 2.03        |
|                                   | Inferred  | 16.22        | 3.10        | 1.62        | 16.22                             | 3.10        | 1.62        |
| <b>Total</b>                      |           | <b>38.05</b> | <b>2.98</b> | <b>3.65</b> | <b>38.05</b>                      | <b>2.98</b> | <b>3.64</b> |
| UG2                               | Measured  | 0.00         | 0.00        | 0.00        | 0.00                              | 0.00        | 0.00        |
|                                   | Indicated | 20.85        | 4.35        | 2.92        | 20.85                             | 4.35        | 2.92        |
|                                   | Inferred  | 16.71        | 4.35        | 2.34        | 16.71                             | 4.35        | 2.34        |
| <b>Total</b>                      |           | <b>37.56</b> | <b>4.35</b> | <b>5.25</b> | <b>37.56</b>                      | <b>4.35</b> | <b>5.25</b> |
| Combined                          | Measured  | 0.00         | 0.00        | 0.00        | 0.00                              | 0.00        | 0.00        |
|                                   | Indicated | 42.68        | 3.60        | 4.94        | 42.68                             | 3.60        | 4.94        |
|                                   | Inferred  | 32.93        | 3.73        | 3.95        | 32.93                             | 3.73        | 3.95        |
| <b>Total</b>                      |           | <b>75.61</b> | <b>3.66</b> | <b>8.90</b> | <b>75.61</b>                      | <b>3.66</b> | <b>8.90</b> |

## DWAALKOP RESERVE ESTIMATE

| 3PGE + Au as at 30 September 2012 |          |              |             |             | 3PGE + Au as at 30 September 2011 |             |             |
|-----------------------------------|----------|--------------|-------------|-------------|-----------------------------------|-------------|-------------|
| Reef                              | Category | Mt           | g/t         | Moz         | Mt                                | g/t         | Moz         |
| Merensky                          | Proven   | 0.00         | 0.00        | 0.00        | 0.00                              | 0.00        | 0.00        |
|                                   | Probable | 13.66        | 2.61        | 1.15        | 13.66                             | 2.61        | 1.15        |
| <b>Total</b>                      |          | <b>13.66</b> | <b>2.61</b> | <b>1.15</b> | <b>13.66</b>                      | <b>2.61</b> | <b>1.15</b> |
| UG2                               | Proven   | 0.00         | 0.00        | 0.00        | 0.00                              | 0.00        | 0.00        |
|                                   | Probable | 16.10        | 3.30        | 1.71        | 16.10                             | 3.30        | 1.71        |
| <b>Total</b>                      |          | <b>16.10</b> | <b>3.30</b> | <b>1.71</b> | <b>16.10</b>                      | <b>3.30</b> | <b>1.71</b> |
| Combined                          | Proven   | 0.00         | 0.00        | 0.00        | 0.00                              | 0.00        | 0.00        |
|                                   | Probable | 29.76        | 2.98        | 2.85        | 29.76                             | 2.98        | 2.85        |
| <b>Total</b>                      |          | <b>29.76</b> | <b>2.98</b> | <b>2.85</b> | <b>29.76</b>                      | <b>2.98</b> | <b>2.85</b> |

|              |      |      |     |     | % metal content                |       |       |
|--------------|------|------|-----|-----|--------------------------------|-------|-------|
| Prill splits | Pt   | Pd   | Rh  | Au  | Cr <sub>2</sub> O <sub>3</sub> | Cu    | Ni    |
| UG2          | 47.1 | 42.8 | 7.9 | 2.2 | no data                        | 0.090 | 0.140 |
| Merensky     | 56.8 | 31.8 | 4.2 | 7.2 | no data                        | 0.110 | 0.170 |

## NOTES ON REPORTING CRITERIA

- Mineral resource tonnages and grades for Zondereinde are reported as estimates discounted for geological and mining pillar losses, all other mineral concessions are reported as estimates discounted for geological losses.
- Mineral resource tonnages and grades are *in situ* estimates inclusive of internal waste dilution, but exclusive of external waste dilution.
- PGM grade is expressed as corrected 4E (combined platinum, palladium, rhodium and gold) grade, this being synonymous with 3PGE+Au.
- PGM metal splits (platinum, palladium, rhodium and gold) are expressed as percentages of the combined 4E value.
- Base metal contents (chromite, copper and nickel) are expressed as weight percentages.
- Structural losses, due to faults, dykes and joints, include the volumes of expected bracket pillars required to be placed on such features.
- Kriging parameters are applied to discrete mining areas in order to estimate tonnage and metal content.
- Kriging parameters are derived from the interrogation of extensive sampling databases.
- Rounding of numbers in the tables may result in minor computational discrepancies; where this occurs it is deemed insignificant.
- The most reasonable mining width is assumed, based on practical mining conditions. 4E grade, as well as specific gravity are calculated for these widths.
- Total mineral resources and reserves attributable to Northam Platinum Limited are listed in the summary tables.
- Mineral resources for Pandora and Dwaalkop, reflecting Northam Platinum Limited's 7.5% and 50.0% respective attributable interests, are quoted as at the end of September 2012 and 2011 and are provided by Lonmin PLC.
- Measured and indicated mineral resources are reported separately and include those mineral resources modified to produce proven and probable mineral reserves.
- Whilst mineral resources are quoted as *in situ* resources, all reserves provided by Northam are quoted at run-of-mine (ROM) grades and tonnages as delivered to the concentrator plants on site and are therefore fully diluted.
- Mineral reserves for Zondereinde mine are quoted to 15 level (2 165 metres below surface).
- Mineral reserves for Booyssendal relate to the first planned mining module, the UG2 North mine.
- Mineral reserves for Pandora and Dwaalkop are provided by Lonmin PLC and reflect Lonmin's reserve modifying factors.
- All references to tonnage are to the metric unit.
- All references to ounces are troy with a conversion factor of 31.103475 used to convert from metric grams to ounces.
- Contact details for lead competent persons are:
  - Mr C van Jaarsveld, chief geologist at Zondereinde mine, PO Box 441, Thabazimbi 0380
  - Mr M Mqadi, chief geologist at Booyssendal UG2 North mine.
  - Mr W Theron, mining manager at Booyssendal UG2 North mine, PO Box 412694, Craighall 2024
  - Mr D Smith, principal member of Prospect Geoservices, PO Box 37876, Faerie Glen 0043