



# BACKGROUND INFORMATON DOCUMENT

# ENVIRONMENTAL AUTHORISATION FOR A PROPOSED OPEN PIT COAL MINE ON THE WELTEVREDEN FARM

**Project Number:** 

NOR1982

Prepared for:

Northern Coal (Pty) Ltd.

#### For any project related information contact:

Digby Wells Environmental - Stakeholder Engagement Office

Steve Horak or Vanessa Viljoen

Tel: (011) 789 9495 of Fax: 086 583 5715

Email: steve.horak@digbywells.com or vanessa.viljoen@digbywells.com

Website: www.digbywells.com under Public Documents

#### DEDET Ref No17/2/3N-272

Digby Wells and Associates (South Africa) (Pty) Ltd (Subsidiary of Digby Wells & Associates (Pty) Ltd). Co. Reg. No. 2010/008577/07. Fern Isle, Section 10, 359 Pretoria Ave Randburg Private Bag X10046, Randburg, 2125, South Africa Tel: +27 11 789 9495, Fax: +27 11 789 9498, info@digbywells.com, <a href="https://www.digbywells.com">www.digbywells.com</a>

Directors: A Sing\*, AR Wilke, LF Koeslag, PD Tanner (British)\*, AJ Reynolds (Chairman) (British)\*, J Leaver\*, GE Trusler (C.E.O)
\*Non-Executive

Environmental Impact Assessment for Weltevreden Coal Mine NOR1982



### 1 PURPOSE OF DOCUMENT

Northern Coal (Pty) Ltd. (Northern Coal) is applying for environmental authorisation for certain listed activities associated with the construction and operation of an open pit coal mine on the farm Weltevreden 381 JT close to Belfast, Mpumalanga Province. This Background Information Document (BID) has been developed in order to:

- Share information about the proposed project;
- Present the Environmental Impact Assessment (EIA) process to be undertaken according to South African legislation;
- Provide detail about the Public Participation (PP) process which will be followed;
- Provide information about the application processes which have been undertaken thus far; and
- Provide information about the various specialist studies that will be carried out as part of this EIA process.

# 1.1 Appointed Environmental Assessment Practitioners

Northern Coal has appointed Digby Wells Environmental (Digby Wells), as an independent Environmental Assessment Practitioner (EAP), to complete the required components of the EIA, as required in terms of the National Environmental Management Act, 1998 (Act 107 of 1998) (NEMA).

#### 2 BACKGROUND

Northern Coal submitted a Mining Right Application (MRA) in 2008 to the Department of Mineral Resources (DMR) which was awarded on 4 December 2013. In order to proceed with the proposed open pit coal mine, Northern Coal needs to apply for environmental authorisation in terms of the NEMA.

# 2.1 Northern Coal Locality Setting

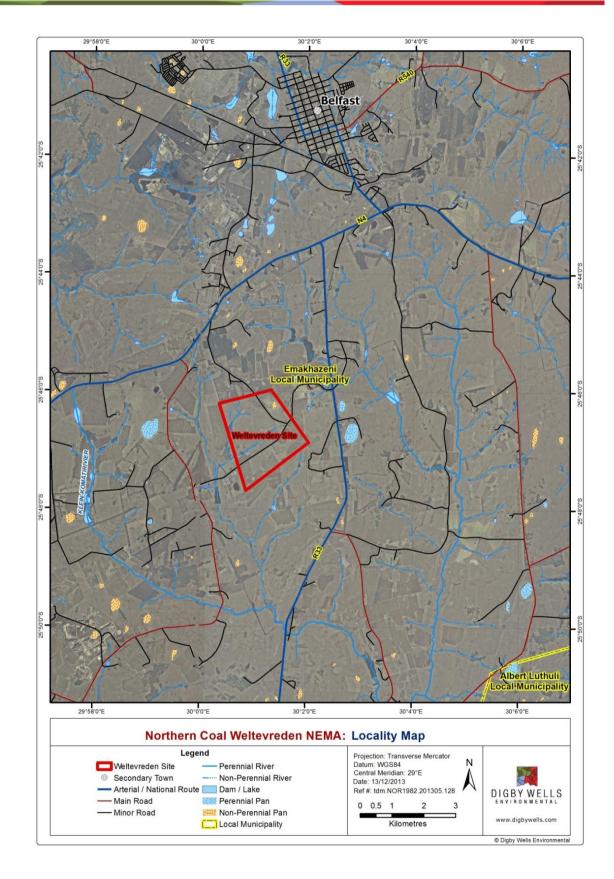
The proposed mine is to be located on portions 15 and 16 of the farm Weltevreden 381 JT, which is located on the south west corner of the junction of the N4 highway and the R33. This junction is 5 km south west of the town of Belfast in Mpumalanga and falls within the Emakhazeni Local Municipality (see Plan 1 on page 3).

#### 3 PROJECT DESCRIPTION

The following mine infrastructure will be developed for the Weltevreden project. A small scale fixed crusher plant will be used on site.. The Electricity supply shall be taken from an existing 11kV overhead reticulation, which crosses Portion 16 of the farm Weltevreden, and is fed from the Belfast / Wonderfontein Line. No existing power lines require relocation or upgrading. Other infrastructure includes a portable temporary office and toilets and portable water storage tanks for domestic use.

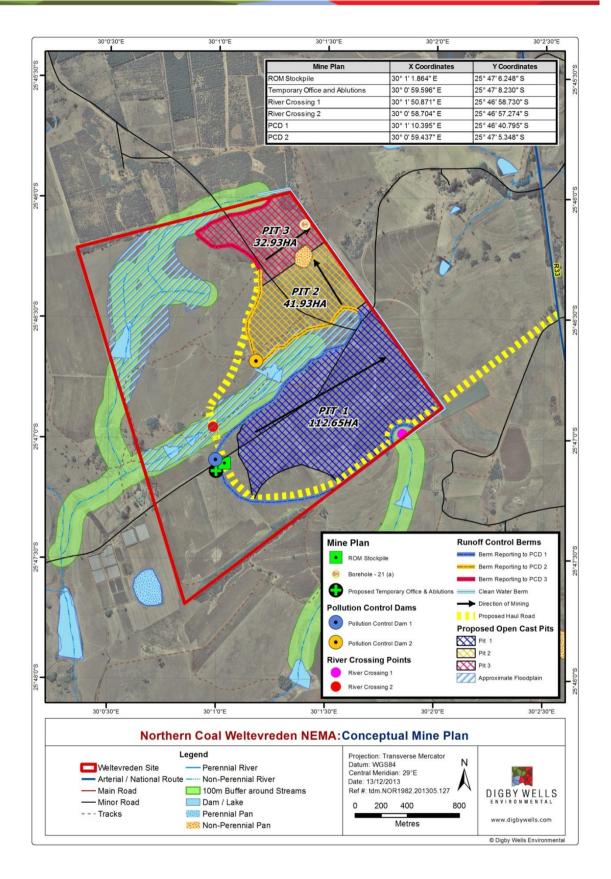
A 46m³ above ground diesel storage facility will be placed within a bunded area. A haul road will be constructed from the R33 to the mining area with a width of 8 m and will be approximately 2 km long. The R33 will be widened to construct a road crossing from the haul road into the R33. Temporary change houses will be placed on site and a diesel workshop will be constructed for maintenance of mine machinery. An explosives magazine will be placed on site. Water diversion berms will be built for dirty water/clean water separation and areas will be cleared and concreted for waste management purposes (none of the waste activities are anticipated to require a waste a management license in terms of Section 21(b) of the National Environmental Management: Waste Act, Act No. 59 of 2008 read together with GNR 921 of 29 November 2013). There will be a topsoil stockpile for rehabilitation purposes and an overburden stockpile for the final open pit void. The conceptual mine plan as shown on Plan 2 indicates the locations of the proposed listed activities that will require environmental authorisation.





Plan 1: Weltevreden Local Setting





Plan 2: Conceptual Mine Plan



### 4 EIA PROCESS AND PUBLIC PARTICIPATION

# 4.1 Legislative Framework

Northern Coal received a Mining Right in terms of the Minerals and Petroleum Resources Development Act, 2002 (Act No. 28 of 2002) (MPRDA) and the required Water Use Licence from the Department of Water Affairs (DWA) in terms of the National Water Act,1998 (Act No. 36 of 1998) (NWA) is pending. Waste produced by the proposed mine is not anticipated to require a Waste Management License in terms of Section 21(b) of the National Environmental Management: Waste Act, 2008 (Act No. 59 of 2008). Authorisation is required for listed activities under Section 24 of the NEMA in terms of the EIA Regulations and Listing Notices 1 and 2 (GN R. 543, GN R. 544 and GN R. 545).

#### The following listed activities will be applied for:

- The construction of two river crossings: Listed Activity 11(xi) of Listing Notice No. 544, 18 June 2010;
- Widening of an existing public road (R33) for the construction of a crossing to the mining site: Listed activity 22(i) of Listing Notice No. 544, 18 June 2010;

The Mpumalanga Department of Economic Development, Environment and Tourism (DEDET) is the decision-making authority for the EIA.

- An approximately 2 km haul road with a width of 8 m: Listed activity 22(ii) and (iii) of Listing Notice No. 544, 18 June 2010;
- The construction of two pollution control dams (PCDs) which requires a Water Use Licence in terms of Section 21(g) of the National Water Act, Act No. 36 of 1998: Listed activity 5 of Listing Notice No. 545, 18 June 2010; and
- A Run of Mine (ROM) Stockpile which requires a Water Use Licence in terms of Section 21(g) of the National Water Act, Act No. 36 of 1998: Listed activity 5 of Listing Notice No. 545, 18 June 2010.

# 4.2 Specialist Studies

A number of specialist studies were undertaken in 2008 for the Mining Right Application to determine the status of the existing environment and to evaluate potential impacts of the project on the natural and social environment. The following studies were undertaken.

- Climate and Air Quality
- Topography and Visual Aspects
- Surface Water
- Fauna and Flora
- Wetlands
- Archaeology and Heritage

- Noise
- Soil, Land Use and Land Capability
- Groundwater
- Aquatic Environment
- Basting and Vibration
- Socio-Economic Environment

These studies will be used to compile the EIA for the NEMA authorisation. In addition to these studies and due to the sensitive nature, location and length of time that has passed since the baseline studies were conducted, additional specialist studies will be undertaken. These are listed below.

#### 4.2.1 Ecological study

Considering the project requirements for the listed activities, selected specialist studies will be conducted in order to update and re-assess the ecology of the site. Specialist studies which will be conducted include fauna and flora, as well as a wetland investigation. The two specialist components will focus primarily on locations of the proposed PCDs, wetland crossings and the haul road.

Environmental Impact Assessment for Weltevreden Coal Mine NOR1982



#### 4.2.2 Surface Water

In order to complete the Surface Water Assessment, specific tasks need to be completed and are specified in sections below:

A desktop assessment will be conducted to achieve the following objective:

- Planning of the surface water quality sampling based on the previous locations for the baseline determination; and
- Compilation of previous water quality data in one WISH database.

A site visit will be conducted to achieve the following:

- To confirm the surface hydrology characterisation is still the same; and
- To collect samples from the determined locations.

# 4.2.3 Geophysical Survey to Assess PCD Sites

Pollution Control Dams (PCDs) will be constructed as part of the mining infrastructure and waste water management for the proposed mine. A geophysical investigation will be conducted for the areas identified for the PCDs to assess whether preferred groundwater flow paths exist within these areas. The construction of a PCD or any mining infrastructure on top of a preferred groundwater flow path might result in contaminants migrating off site and negatively impacting the receiving environment. These potential impacts need to be determined and mitigation measures need to be developed.

# 4.3 Public Participation

All stakeholders who may be affected by or interested in the proposed project are invited to register as an Interested and Affected Party (I&AP) in order to become involved in the EIA and PP processes. The following aniticipated dates are importnt to note for the PP process going forward:

- Availability of Draft Reports for public comment: February March 2014
- Stakeholder meetings to be held during the public comment period: February/March 2014
- Availability of Final Reports for public comment: April 2014

Registered I&APs will be informed about availability of reports and scheduled stakeholder meetings by preferred means of communication (email, post or fax). Contributions from stakeholders will assist in informed decision-making for authorities and provides information to be considered by the project team and specialists conducting studies. All comments can be submitted using the contct details which appear on the cover page or as part of the Comment and Registration Sheet.