

4/23/2020

Background Information Document (BID) for Paula Poultry Abattoir, Brandfort, Masilonyana Municipality, Free State

Project No: MB_20191218_Paula



Report prepared for

Paula Farm, Brandfort

DWS Reference Number: TBD

Environmental Assessment Ref: TBD

Michelle Boshoff SM SERVICES & CONSULTING Pty Ltd Reg. No. 2016/347600/07 Background Information Document (BID) for Paula Poultry Abattoir, Brandfort, Masilonyana Municipality, Free State

APPLICANT:

ESTAIN DE SWARDT PAULA FARM BRANDFORT MASILONYANA MUNICIPOALITY

ENVIRONMENTAL ASSERSSMENT PRACTITIONER (EAP):

SM SERVICES & CONSULTING PTY LTD P. O. BOX 1741 FICKSBURG 9730 FREE STATE SOUTH AFRICA

e-mail: <u>Michelle.Boshoff10@gmail.com</u> website: <u>www.smconsult.co.za</u>

TEL: +27 82 893 8537

SM Services & Consulting Project No: Project No: MB_20191218_Farm Paula Abattoir

April 2020

Compiled by:

Michelle Boshoff Senior Manager

Email: Michelle.Boshoff10@gmail.com

Author: Michelle Boshoff

SM SERVICES & CONSULTING PROPOSAL FOR WATER USE LISENCE APPLICATION AND BASIC ASSESSMENT For Paula Poultry Abattoir

Contents

Background	. 2
Purpose of this document	. 3
Location of the Project	. 3
Overview of the Project	. 4
Proposed project implementation	. 4
Topography and landscape features of the area	. 6
Development Principles	. 8
Legal Requirements	. 9
National Environmental Management Act, Act 107 of 1998	. 9
EIA Process of Basic Assessment	10
National Water Act, Act 36 of 1998	10
Water Use Process	12
Registration as Interested and Affected Party (IAP) to participate in this process	13

BACKGROUND

SM Services and Consulting Pty Ltd has been appointed by the Applicant, Mr. Estian de Swardt as an independent environmental consultant to conduct the required environmental impact assessment (Basic Assessment Report) (BAR) in terms of the Environmental Impact Assessment Regulations, 2010, promulgated in terms of the National Environmental Management Act, 1998 (Act No. 107 of 1998), as amended, for the proposed construction of an abattoir on the Farm Paula. Concurrent to the BAR, an application for a water use license (WULA) in terms of Section 21 and associated activities will be launched to meet the requirements of the National Water Act, 1998 (Act No 36 of 1998)(NWA).

PURPOSE OF THIS DOCUMENT

This document serves to provide interested and affected parties (IAPs) with background information on the proposed project, its potential impacts, the application and BAR/public participation process. It also outlines the manner in which IAPs can become involved in the Project, receive information and raise any issues that may be of interest and / or concern to them.

The nature of the environmental impact assessment process involves *inter alia* the undertaking of technical and scientific investigations related to the potential impacts of the Project. It is therefore essential that IAPs, through the public participation process (PPP), become actively involved in the Projects environmental assessment process in order to share information and provide input that will be useful in assisting the relevant authorities for informed decision-making purposes in so far the Project is concerned.

LOCATION OF THE PROJECT

The Farm Paula is located outside Brandfort, within Ward 2 of the Masilonyana Municipality with the Lejweleputswa District Municipality. The Farm Paula falls within the C52G Quaternary Drainage Region. Please refer to Figure 1: Location of Paula Farm and the proposed abattoir.

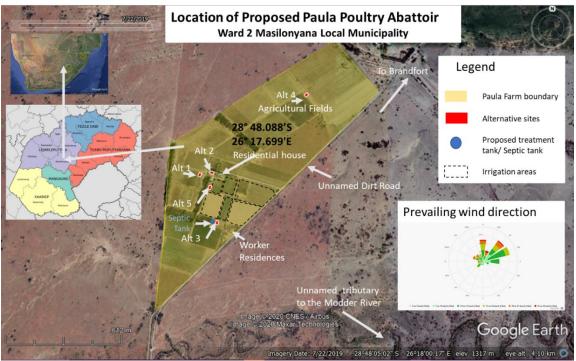


Figure 1: Location of Paula Farm and the proposed abattoir.

OVERVIEW OF THE PROJECT

It is proposed to establish a Poultry Abattoir on the Farm Paula, Brandfort within the Masilonyana Municipality.

The Farm Paula has an existing lawful water use under section 35(4) of the National Water Act, 1998 (Act 36 of 1998), register number 23094688 on 1 November 2014 for abstraction for agricultural purposes from the boreholes.

The farm has been extensively used for agricultural activities in the past and current activities include sheep farming and food production (maize, beans, etc). Some agricultural fields are under irrigation. Please refer to Figure 2: Timeline of development on the Farm Paula from 2001 till 2019 to see agricultural activities since 2001 on the farm.



Figure 2: Timeline of development on the Farm Paula from 2001 till 2019

The abattoir will be located within the farm boundaries and will be approximately 27,3m X 6,4m. It will also have two ablution facilities - one for women and one for men. It is anticipated that 800 chickens per day will be slaughtered and prepared for the market. Waste streams will be limited to effluent (containing predominantly blood) and feathers. Effluent will be treated in a septic tank system and be utilized for irrigation on the farm. Feathers will be buried and covered for natural breakdown. It is anticipated that most of the chicken parts will be process and packaged for the market to sell.

This project is considered as an economic growth and upliftment project that will provide 12 to 17 initial job opportunities to the local community in Masilonyana Municipality. The project is in line with the Integrated Development Plan (IDP) of 2016/2017 and the Comprehensive Rural Development Program (CRDP) of 2006 for the area that promote livestock farming and associated value chain development.

PROPOSED PROJECT IMPLEMENTATION

The Applicant proposes the following:

• Construct a poultry abattoir on the Farm Paula;

- Slaughtering of up to 800 poultry units per day;
- Waste from the abattoir will be treated in a closed system digester (tank). The treated effluent and sludge will then be used as natural fertilizer on the crops grown on the farm. No residual waste or disposal are anticipated;
- Trained staff will carry out the reception and ante-mortem care of the livestock;
- The Applicant will have the duty to ensure that animals endure as little stress as possible;
- All animals will have access to water on arrival to the abattoir;
- The project is a key economic development niche for the area and proudly South African;
- The project will stimulate and generate employment in the Masilonyana Municipality as per the IDP planning for the area.

The 180m² abattoir will measure 27,3m by 6,4m (please refer to Figure 4: Proposed layout of the poultry abattoir) with an adjacent holding pen for the daily quota of livestock units to be slaughtered. There are currently various out-buildings and associated infrastructure



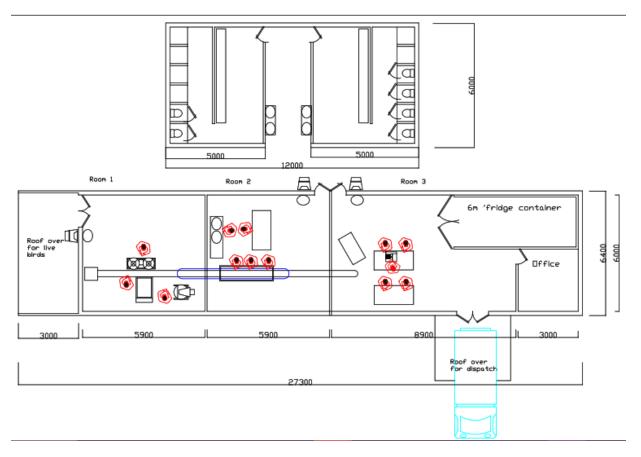
in place on the property. This include a cooling room (

Figure 3: Existing fridge facilities on the Farm Paula., out-buildings, existing access roads, power supply, water supply and livestock holding pens.

It is recognized that the Project will generate some solid waste (feathers) and wastewater / effluent. The feathers will be placed in a sand pit and covered with sand whereby it will naturally break down. This will then be composted and used as natural supplements in the crop production process. The same process will be followed with the wastewater / effluent that will be treated with biological agents and after treatment used to supplement irrigation water. All products will be utilized, and no residual waste dumps are anticipated.



Figure 3: Existing fridge facilities on the Farm Paula.





TOPOGRAPHY AND LANDSCAPE FEATURES OF THE AREA

The topography of the area is moderately flat and with a slight slope towards the south west. Please refer to Figure 5: View over the Farm Paula and Figure 4: View of the Farm Paula.



Figure 3: View over the Farm Paula



Figure 4: View of the Farm Paula

DEVELOPMENT PRINCIPLES

The following will be implemented by the Project:

- The Project will aim to implement the waste minimization hierarchy of waste management that will include avoidance (by optimizing on all chicken parts as products), where it cannot be avoided (e.g. the effluent from the cleaning and washing of facilities), it will be minimized and reused (by treating the effluent with bio-reactors and utilizing the nutrient rich effluent on irrigation on crops. This will in return limit the use of commercial fertilizer and chemical usage on the crops). Organic materials such as the feathers will be buried in sand pits and later utilized as compost once it has decomposed.
- The Project focus on environmental health and safety throughout its life cycle.

- The Project aim to stimulate economic growth in the Masilonyana Municipal area, and although the project is small, it will provide job opportunities for local communities either directly (work in abattoir) or indirectly (local spaza's and restaurants purchasing poultry to provide cooked meals to their customers).
- Development will aim at minimizing disturbance to natural vegetation as sites (alternatives) have been identified within areas that have already been cleared / used in the past for agricultural activities. Existing roads on the property will be utilized.
- Through its waste minimization and re-use policy, this project is regarded as innovative and aimed at utilizing each product from the chicken and limiting waste to effluent that will be re-used through irrigation on crops – effectively optimizing the closed-loop recycling. This way recycling of a material can be done indefinitely without degradation of the property.

LEGAL REQUIREMENTS

National Environmental Management Act, Act 107 of 1998

Government Notice of GNR 326 dated 4 Dec 2014 requires that a Basic Assessment Report (BAR) be conducted for a project of this nature and design, and more particularly activity numbers 3 and 4 trigger the application respectively as follows:

3. The development and related operation of facilities or infrastructure for the slaughter of animals with a -

(i) product throughput of poultry exceeding 50 poultry per day.

4. The development and related operation of facilities of infrastructure for the concentration of animals in densities that exceed –

(i) 20 square meters per large stock unit and more than 500 units per facility;

ii) 8 square meters per small stock unit and;

a. more than 1000 units per facility excluding pigs where (b) applies;

EIA Process of Basic Assessment

- <u>Application Form</u>: An Official application for is completed and submitted to the competent authority. This form provides all the necessary information.
- <u>Public Participation</u>: The general public and relevant authorities are notified of the proposed development through newspaper adverts, site notices and direct consultation. This BID will be circulated to neighbouring landowners, relevant authorities and any other persons registered as IAP's following the feedback from adverts and site notices.
- <u>Identification</u> of impacts and alternatives, environmental issues and concerns, development alternatives and constraints will e identified using professional judgement, site visits and construction with the authorities and the public.
- <u>Mitigation:</u> Measures to mnage and minimize impacts within acceptable levels will be identified and recorded in the BAR. An environmental management plan will be compiled to facilitate the implementation of the project.
- The basic assessment report and environmental management plan will be circulated to all registered IAPs for review and comments. All comments and responses will be collated and added as an annexure to the final BAR.
- <u>Final Decision / Authorisation</u> All information arising from the basic assessment process will be reviewed by the relevant authorities before they make a final decision to approve or reject the application for the proposed activity.

National Water Act, Act 36 of 1998

South Africa's National Water Act (No. 36 of 1998) replaced all previous rights to water use with an entitlement under the new Act. The National Water Act (NWA) now only makes provision for one's "right" to water, the Reserve. This is the water required to maintain the ecosystem and basic human needs. Except for the water required for this Reserve and basic human needs use, all other water uses must be authorised by the Department of Water and Sanitation or a Catchment Management Agency (CMA).

The legal framework for water use authorisation is:

- The Constitution of the Republic of South Africa
- The National Water Act (No. 26 of 1998)
- The National Water Amendment Act (No. 27 of 2014)
- The Procedural Requirements for Water Use License Applications and Appeals (Regulation).

It is necessary to authorize water use:

- To protect water resources
- To promote equitable access to water
- To facilitate social and economic development
- To protect aquatic and associated ecosystems and their biological diversity and
- To meet international obligations.

There are four types of water use authorisations:

Types of water use authorisations		
Schedule 1	 Water Use constitutes: water taken for reasonable domestic use in a person's household from any source small gardening (but not for commercial purposes) watering of livestock (excluding feedlots) that graze on that land (within the carrying capacity of that property) storing and using run-off water from a roof (rain water harvesting) in emergencies, e.g. fire-fighting recreation, e.g. swimming, angling, etc. 	
	A Catchment Management Agency (CMA) may limit the taking of water in terms of Schedule 1 (Schedule 3(2)(e) of the Act). Water users in this category can commence with their activities without informing the Department	
General Authorisations	General Authorisations is an authorisation to use water without a license, provided that the water use is within certain limits and complies with conditions set out in the Gazetted General Authorisation. This authorisation requires a registration with the Department prior to exercising the water use(s)	
Existing Lawful Use	Existing Lawful Water Use means the use of water authorised by or under any law that took place at any time for a period of two years before the commencement of the NWA, i.e. prior to 1998.	
	An Existing Lawful Water Use, with any conditions attached, is recognized but may continue only to the extent that it is not limited, prohibited or terminated by this Act. No license is required to continue with an Existing Lawful Water Use until a responsible authority requires a person claiming such an entitlement to apply for a license. If a license is issued it becomes the source of authority for the water use. If a license is not granted the use is no longer permissible. This authorisation requires a registration with the Department	
Licensed Water Use (see list below)	A responsible authority may dispense with the requirement for water use license if it is satisfied that the purpose of this Act will be met by a license, permit of other Authorisation granted under any other law. Person(s) intending to use water in this category should write a letter, attaching the relevant authorisation to request the Department to dispense with the requirements of a water use license	

The following activities constitute water uses and may require authorisation in terms of Section 21 of the National Water Act for this Project:

Section 21	Water Use	Example
e)	Engaging in a controlled activity identified as such in section 37(1) or declared under section 28(1) of the NWA	Irrigation with water containing waste, artificial recharge of aquifer, modification of atmospheric precipitation and in-stream power generation activities. In this Project wastewater will be biologically treated with bacteria, nematodes, or other small organisms to break down organic wastes using normal cellular processes, prior to use.
f)	Discharging waste or water containing waste into a water resource	Discharging of water containing waste into a surface water resource, e.g. discharging treated effluent into a river or a wetland. In this Project wastewater may reach the ground water, however mitigation measures will be implemented to negate this.
g)	Disposing of waste in a manner which may detrimentally impact on a water resource	Disposal of effluent into a water containment facility, dust suppression and stockpiles. In this Project wastewater will be temporarily stored / contained and biologically treated with bacteria, nematodes, or other small organisms to break down organic wastes using normal cellular processes.

Water Use Process

- <u>Pre-Application process</u>: Once a listed activity/ies is/are identified as per Section 21 of the NWA, a pre-application meeting with the relevant department must be held. Thus, may be accompanied by the license application. The Department¹ need to assess the application and indicate what is needed to process the application. Applicants will be requested to provide missing information. The Department will provide preliminary feedback before the application fee (R114.00) is requested.
- <u>Application Initiation:</u> The Department determines the information required to compile a water use license application technical report to support the application. The determination of information requirements will be based on the information contained on the form or the site inspection, if required.
- <u>Screening</u>: During this phase the Department screen the submitted technical reports. Once the reports have been reviewed they can be accepted, rejected or more information may be requested by the Department.
- <u>Processing and Finalizing:</u> This includes the assessment of the Technical Report where the information is presented and evaluated by specialist groups within the Department, and recommendations are provided to the Delegated Authority for a decision.
- <u>Decision by the Delegated Authority:</u> After considering all the relevant information, the Delegated Authority will make a decision on whether to approve the application.

¹ Department of Water and Sanitation

REGISTRATION AS INTERESTED AND AFFECTED PARTY (IAP) TO PARTICIPATE IN THIS PROCESS

It is a requirement in terms of Section 42 of Government Notice 326 of 7 April 2017 that interested and affected parties are to request in writing that their names be placed on the register of Interested and Affected Parties (IAPs).

Should you wish to register as an Interested and Affected Party or have any comments on the proposed Project, kindly complete the registration and response form below and provide comments, concerns, support or inputs regarding any potential environmental, cultural, socio-economic that you deem necessary for consideration about this Project.

Clearly state the nature of interest that you may have with regards to this matter. By registering on the Project database – you will be notified as and when information on the project is available.

All comments should be submitted within 30 days of receipt of this BID and accompanying notice

Please forward your detailed response and full name, address and contact number in writing (or via email) to the attention of:

The Basic Assessment Officer SM Services and Consulting Pty Ltd P. O. Box 1741 Ficksburg 9730 Email: Michelle.Boshoff10@gmail.com Cell: +27 82 893 8537

Registration and Comment Sheet

Public Participation Process for Paula Farm Abattoir

Title & Initials			
Name			
Surname			
Organisation / or Property			
Interest in Project e.g. neighbour			
Physical Address			
Postal Address			
Cell / Phone No.			
Email:			
In accordance with NEMA – Section 43 (1) – A registered interested and affected party is entitled to comment, in writing, on all reports or plans submitted to such party during the public participation process contemplated in these Regulations and to bring to the attention of the proponent or applicant any issues which that party believes may be of significance to the consideration of the application, provided that the interested and affected party discloses any direct business, financial, personal or other interest which that party may have in the approval or refusal of the application.			
Please supply such information in the space provided below.			
The following issues / concern / recor 1	nmendation must be noted:		
2			
3			
Submit to:			

The Basic Assessment Officer SM Services and Consulting Pty Ltd

P. O. Box 1741, Ficksburg, 9730 Email: <u>Michelle.Boshoff10@gmail.com</u> or Cell: +27 82 893 8537