

REFERENCE: 16/3/3/1/F5/16/2002/21 NEAS REFERENCE: WCP/EIA/0000859/2021 DATE: 13 September 2021

The Board of Directors Black Orchid Farming Pty (Ltd). P. O. Box 6100 **ROGGEBAAI** 8012

Attention: Ms. Mine van Wyk

Tel.: (021) 421 2129 E-mail: <u>Mine.van.wyk@uff.co.za</u>

Dear Madam

APPLICATION FOR ENVIRONMENTAL AUTHORISATION IN TERMS OF THE NATIONAL ENVIRONMENTAL MANAGEMENT ACT, 1998 (ACT NO. 107 OF 1998) AND THE ENVIRONMENTAL IMPACT ASSESSMENT REGULATIONS, 2014 (AS AMENDED) FOR THE PROPOSED EXPANSION OF AN INSTREAM DAM ON THE REMAINDER OF FARM ZWARTFONTEIN NO. 792 AND PORTION 8 OF THE FARM ZWARTFONTEIN NO. 792, ZWARTFONTEIN, MALMESBURY.

- 1. With reference to the above application, this Department hereby notifies you of its decision to **grant** Environmental Authorisation, attached herewith, together with the reasons for the decision.
- 2. In terms of Regulation 4 of the Environmental Impact Assessment Regulations, 2014 (as amended), you are instructed to ensure, within 14 days of the date of the Environmental Authorisation, that all registered interested and affected parties ("I&APs") are provided with access to and reasons for the decision, and that all registered I&APs are notified of their right to appeal.
- 3. Your attention is drawn to Chapter 2 of the Appeal Regulations, 2014 (as amended), which prescribes the appeal procedure to be followed. This procedure is summarised in the attached Environmental Authorisation.

Yours faithfully

MR. ZAAHIR TOEFY DIRECTOR: DEVELOPMENT MANAGEMENT (REGION 1)

Copied to: (1) Mr. A Mader / Mr. C Clinton Geyser (EnviroAfrica) (2) Mr. A Zaayman (Swartland Municipality) Email: <u>anthony@enviroafrica.co.za</u> / <u>clinton@enviroafrica.co.za</u> Email: <u>swartlandmun@swartland.org.za</u>



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 REFERENCE:
 16/3/3/1/F5/16/2002/21

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 DATE OF ISSUE:
 13 September 2021

ENVIRONMENTAL AUTHORISATION

APPLICATION FOR ENVIRONMENTAL AUTHORISATION IN TERMS OF THE NATIONAL ENVIRONMENTAL MANAGEMENT ACT, 1998 (ACT NO. 107 OF 1998) AND THE ENVIRONMENTAL IMPACT ASSESSMENT REGULATIONS, 2014, AS AMENDED: PROPOSED EXPANSION OF AN INSTREAM DAM ON THE REMAINDER OF FARM ZWARTFONTEIN NO. 792 AND PORTION 8 OF THE FARM ZWARTFONTEIN NO. 792, ZWARTFONTEIN, MALMESBURY.

With reference to your application for the abovementioned, find below the outcome with respect to this application.

DECISION

By virtue of the powers conferred on it by the National Environmental Management Act, 1998 (Act No. 107 of 1998) ("NEMA") and the Environmental Impact Assessment ("EIA") Regulations, 2014 (as amended), the Competent Authority herewith **grants Environmental Authorisation** to the applicant to undertake the listed activity specified in section B below with respect to Layout/Design Alternative A: Option 10, described in the Final Basic Assessment ("BAR"), dated May 2021.

The applicant for this Environmental Authorisation is required to comply with the conditions set out in section E below.

A. DETAILS OF THE APPLICANT FOR THIS ENVIRONMENTAL AUTHORISATION

Black Orchid Farming Pty (Ltd). c/o Ms. Mine van Wyk P. O. Box 6100 **ROGGEBAAI** 8012

Tel.: (021) 421 2129 E-mail: <u>Mine.van.wyk@uff.co.za</u>

The abovementioned applicant is the holder of this Environmental Authorisation and is hereinafter referred to as "**the holder**".

B. LIST OF ACTIVITIES AUTHORISED

	Activities	Activity/Project Description
-	g Notice 1 of the EIA Regulations, 2014	
	mended)-	
	ity Number: 12 ity Description: "The development of— dams or weirs, where the dam or weir, including infrastructure and water surface area, exceeds 100 square	The relocation of the pumphouse will take place within 32 metres of a watercourse and will have a footprint of approximately 200m ² .
(ii)	metres; or infrastructure or structures with a physical footprint of 100 square metres or more;	
wher (a) (b) (c)	e such development occurs— within a watercourse; in front of a development setback; or if no development setback exists, within 32 metres of a watercourse, measured from the edge of a watercourse; —	
exclu (aa)	ding— the development of infrastructure or structures within existing ports or harbours that will not increase the development footprint of the port or harbour;	
(bb)	where such development activities are related to the development of a port or harbour, in which case activity 26 in Listing Notice 2 of 2014 applies;	
(cc)	activities listed in activity 14 in Listing Notice 2 of 2014 or activity 14 in Listing Notice 3 of 2014, in which case that	
activity applies; (dd) where such development occurs within an urban area;		
(ee)	where such development occurs within existing roads, road reserves or railway line reserves; or	
(ff)	the development of temporary infrastructure or structures where such infrastructure or structures will be removed within 6 weeks of the commencement of development and where indigenous vegetation will not be cleared".	
Listing Notice 1 of the EIA Regulations, 2014 (as amended)– Activity Number: 19 Activity Description: "The infilling or depositing of any material of more than 10 cubic metres into, or the dredging, excavation, removal or moving of soil, sand, shells, shell grit, pebbles or rock of more than 10 cubic metres from a watercourse;		Earthmoving activities relating to the in-stream dam will exceed 10m ³ .
but excluding where such infilling, depositing, dredging, excavation, removal		

or m	oving—	
(a)	will occur behind a development	
	setback;	
(b)	is for maintenance purposes	
	undertaken in accordance with a	
	maintenance management plan;	
(C)	falls within the ambit of activity 21 in	
	this Notice, in which case that activity	
	applies;	
(d)	occurs within existing ports or harbours	
	that will not increase the	
	development footprint of the port or	
	harbour; or	
(e)	where such development is related to	
	the development of a port or harbour,	
	in which case activity 26 in Listing	
	Notice 2 of 2014 applies".	
Listing	g Notice 1 of the EIA Regulations, 2014	
(as a	mended)-	
	ity Number: 27	
Activ	ity Description: "The clearance of an	Approximately 5ha of indigenous vegetation will be
area	of 1 hectares or more, but less than 20	cleared.
hect	ares of indigenous vegetation, except	
wher	e such clearance of indigenous	
vege	tation is required for—	
(i)	the undertaking of a linear activity; or	
(ii)	maintenance purposes undertaken in	
	accordance with a maintenance	
	management plan".	
	g Notice 1 of the EIA Regulations, 2014	
	mended)-	
	ity Number: 31	
	ity Description: "The decommissioning	The proposed dam expansion, the associated Dam
of	existing facilities, structures or	infrastructure, including the pumphouse, will be
	tructure for—	relocated and resulting in the decommissioning of
(i)	any development and related	the pumphouse.
	operation activity or activities listed in	
	this Notice, Listing Notice 2 of 2014 or	
<i>(</i> ::)	Listing Notice 3 of 2014;	
(ii)	any expansion and related operation	
	activity or activities listed in this	
	Notice, Listing Notice 2 of 2014 or	
(;;;)	Listing Notice 3 of 2014;	
(iii)	any phased activity or activities for	
	development and related operation	
	activity or expansion or related operation activities listed in this Notice	
	-	
(ind	or Listing Notice 3 of 2014; or	
(iv)	any activity regardless the time the activity was commenced with, where	
	such activity:	
	(a) is similarly listed to an activity in (i)	
	or (ii) above; and	
	(b) is still in operation or	
	development is still in progress;	
oval		
	uding where—	
	activity 22 of this notice applies; or the decommissioning is covered by	
(hh)		
(bb)	part 8 of the National Environmental	

		1
	Management: Waste Act, 2008 (Act	
	No. 59 of 2008) in which case the National Environmental	
	Management: Waste Act, 2008	
	applies".	
Listing	g Notice 1 of the EIA Regulations, 2014	
	mended)-	
•	ity Number: 45	
Activ	ity Description: "The expansion of	The proposed dam expansion infrastructure will have
	tructure for the bulk transportation of	pipes with an internal diameter of more than 0.36m,
	r or storm water where the existing	a throughput capacity of more than 120 litres per
	tructure—	second and an increased throughput capacity
(i)	has an internal diameter of 0,36 metres or more; or	exceeding 10%. These activities will also take place outside the urban area of Malmesbury.
(ii)	has a peak throughput of 120 litres per	
(")	second or more: and	
(a)	where the facility or infrastructure is	
. ,	expanded by more than 1 000 metres	
	in length; or	
(b)	where the throughput capacity of the	
	facility or infrastructure will be	
	increased by 10% or more;	
exclu	iding where such expansion—	
(aa)	relates to transportation of water or	
	storm water within a road reserve or	
	railway line reserve; or	
	will occur within an urban area".	
	g Notice 1 of the EIA Regulations, 2014	
	mended)– ity Number: 48	
	ity Description: "The expansion of—	The in-stream dam will be expanded by more than
(i)	infrastructure or structures where the	100m².
.,	physical footprint is expanded by 100	
	square metres or more; or	
(ii)	dams or weirs, where the dam or weir,	
	including infrastructure and water	
	surface area, is expanded by 100	
	square metres or more;	
	e such expansion occurs—	
(a)	within a watercourse;	
(b)	in front of a development setback; or	
(C)	if no development setback exists,	
	within 32 metres of a watercourse, measured from the edge of a	
	watercourse;	
	iding— the expansion of infrastructure or	
[00]	the expansion of intrastructure or structures within existing ports or	
	harbours that will not increase the	
	development footprint of the port or	
	harbour;	
(bb)	where such expansion activities are	
	related to the development of a port	
	or harbour, in which case activity 26 in	
	Listing Notice 2 of 2014 applies;	
(cc)	activities listed in activity 14 in Listing	
	Notice 2 of 2014 or activity 14 in Listing	
	Notice 3 of 2014, in which case that	

activity applies;	
(dd) where such expansion occurs within	
an urban area; or	
(ee) where such expansion occurs within	
existing roads, road reserves or railway line reserves".	
Listing Notice 1 of the EIA Regulations, 2014	
(as amended)–	
Activity Number: 50	
Activity Description: "The expansion of	The in-stream dam capacity will be increased by 765
facilities or infrastructure for the off-stream	000m ³ which will require the excavation of material
storage of water, including dams and	to increase the dam wall height.
reservoirs, where the combined capacity	
will be increased by 50 000 cubic metres or	
more".	
Listing Notice 1 of the EIA Regulations, 2014	
(as amended)–	
Activity Number: 66	
Activity Description: "The expansion of a	The proposed dam expansion includes the raising of
dam where—	the dam wall height where the current dam height of
(i) the highest part of the dam wall, as	11.7m will be raised to a total of 22.5m (i.e. an
measured from the outside toe of the	increase of 10.8m).
wall to the highest part of the wall,	
was originally 5 metres or higher and	
where the height of the wall is	
increased by 2,5 metres or more; or(ii) where the high-water mark of the dam	
(ii) where the high-water mark of the dam will be increased with 10 hectares or	
more".	
Listing Notice 3 of the EIA Regulations, 2014	
(as amended)-	
Activity Number: 4	
Activity Description: "The development of a	A road measuring approximately 10m in width and
road wider than 4 metres with a reserve less	1600m in length will be constructed outside an urban
than 13,5 metres.	area comprising containing indigenous vegetation.
a. Western Cape	
<i>i.</i> Areas zoned for use as public open	
space or equivalent zoning;	
ii. Areas outside urban areas;	
(aa) Areas containing indigenous	
vegetation; (bb) Areas on the estuary side of the	
development setback line or in	
an estuarine functional zone	
where no such setback line has	
been determined; or	
iii. Inside urban areas:	
(aa) Areas zoned for conservation	
use; or	
Areas designated for conservation use in	
Spatial Development Frameworks adopted	
by the competent authority".	
Listing Notice 3 of the EIA Regulations, 2014	
(as amended)-	
Activity Number: 12	
Activity Description: "The clearance of an	More than 300 square metres of Swartland Shale
area of 300 square metres or more of	Renosterveld will be cleared.
indigenous vegetation except where such	
clearance of indigenous vegetation is	
required for maintenance purposes	

Jnde	ertaken in accordance with a
mair	ntenance management plan.
i.	Western Cape
i.	Within any critically endangered or
	endangered ecosystem listed in terms
	of section 52 of the NEMBA or prior to
	the publication of such a list, within an
	area that has been identified as
	critically endangered in the National
	Spatial Biodiversity Assessment 2004;
ii.	Within critical biodiversity areas
	identified in bioregional plans;
iii.	Within the littoral active zone or 100
	metres inland from high water mark of
	the sea or an estuarine functional zone, whichever distance is the
	greater, excluding where such
	removal will occur behind the
	development setback line on erven in
	urban areas;
iv.	On land, where, at the time of the
	coming into effect of this Notice or
	thereafter such land was zoned open
	space, conservation or had an
	equivalent zoning; or
v.	On land designated for protection or
	conservation purposes in an
	Environmental Management
	Framework adopted in the prescribed
	manner, or a Spatial Development
	Framework adopted by the MEC or
	Minister".

The abovementioned list is hereinafter referred to as "the listed activities".

The holder is herein authorised to undertake the following alternative that includes the listed activities relating to the development proposal:

The proposed development includes the following components:

- expansion of the existing storage capacity of approximately 150 000m³ to a total storage capacity of approximately 915 000 m³;
- raising dam wall height of approximately 11.7m to a total of height of approximately 22.5m;
- increasing the existing dam footprint of approximately 36 000m² to a total of approximately 109 000m²;
- relocation of the pumphouse to a new location with a footprint of approximately 200m²;
- replacement and extension of the existing outlet pipeline with a new pipeline;
- relocation of the existing electrical infrastructure;
- relocation and extension of the existing irrigation pipelines;
- the construction of an approximate 100m² compost storage facility; and
- construction of an approximate 10m wide and 1600m long access road along the new dam footprint.

The expansion of the Zwartfontein dam comprise the following design dimensions:

Freeboard- approximately 1.2m Wall crest width-approximately 4m Wall length -approximately 696m

The total development footprint will amount to approximately 10.9ha.

C. SITE DESCRIPTION AND LOCATION

The listed activities will be undertaken on the Remainder of Farm Zwartfontein No. 792 and Portion 8 of the Farm Zwartfontein No. 792, Malmesbury.

The SG digit codes are:

Remainder of Farm Zwartfontein No. 792 C0460000000079200000

Portion 8 of the Farm Zwartfontein No. 792 C0460000000079200008

The co-ordinates for the Remainder of Farm Zwartfontein No. 792 are:

33° 30' 08.36" South; 18° 54' 17.65 " East

The co-ordinates for the Portion 8 of the Farm Zwartfontein No. 792 are:

33° 30' 30.72" South; 18° 54' 27.05 " East

The co-ordinates for the proposed road are:

33° 30' 29.06 " South; 18° 54' 35.14 " East 33° 30' 28.09 " South; 18° 54' 39.06 " East 33° 30' 29.61 " South; 18° 54' 42.65 " East 33° 30' 32.22 " South; 18° 54' 45.08 " East 33° 30' 35.44 " South; 18° 54' 44.57 " East 33° 30' 37.93 " South; 18° 54' 42.18 " East 33° 30' 40.45 " South; 18° 54' 39.90 " East 33° 30' 40.45 " South; 18° 54' 37.26 " East 33° 30' 40.85 " South; 18° 54' 34.17 " East 33° 30' 40.66 " South; 18° 54' 30.33 " East 33° 30' 38.31 " South; 18° 54' 26.82 " East 33° 30' 36.23 " South; 18° 54' 29.20 " East 33° 30' 34.41 " South; 18° 54' 32.25 " East 33° 30' 31.59 " South; 18° 54' 34.06 " East

The co-ordinates for the proposed irrigation pipes are:

33° 30' 28.96" South; 18° 54' 34.50 " East 33° 30' 27.86" South; 18° 54' 38.08 " East 33° 30' 28.50" South; 18° 54' 41.87 " East 33° 30' 30.36" South; 18° 54' 44.97 " East 33° 30' 33.38" South; 18° 54' 46.18 " East 33° 30' 36.56" South; 18° 54' 45.58 " East 33° 30' 39.37" South; 18° 54' 44.66 " East 33° 30' 41.17" South; 18° 54' 41.59 " East 33° 30' 43.15" South; 18° 54' 38.39 " East 33° 30' 41.36" South; 18° 54' 35.76 " East 33° 30' 40.53" South; 18° 54' 31.97 " East 33° 30' 39.24" South; 18° 54' 28.54 " East 33° 30' 38.94" South; 18° 54' 27.88 " East

The co-ordinates for the proposed relocated pumphouse are:

33° 30' 37.43 " South; 18° 54' 45.57 " East

Refer to Annexure 1: Locality Plan.

Refer to Annexure 2: Site Development Plan.

The above is hereinafter referred to as "the site".

D. DETAILS OF THE ENVIRONMENTAL ASSESSMENT PRACTITIONER

EnviroAfrica cc c/o Mr. Anthony Mader P. O. Box 5367 HELDERBERG 7135

Cell.: 083 309 921 1 Email: <u>anthony@enviroafrica.co.za</u>

E. CONDITIONS OF AUTHORISATION

Scope of authorisation

- 1. The holder is authorised to undertake the listed activities specified in Section B above in accordance with and restricted to the preferred Layout/Design Alternative A: Option 10 described in the Final BAR dated May 2021, on the site as described in Section C above.
- 2. Authorisation of the activities is subject to compliance with the conditions set out in this Environmental Authorisation. The holder must ensure compliance with the conditions by any person acting on his/her behalf, including an agent, sub-contractor, employee or any person rendering a service to the holder.
- 3. The holder must commence with, and conclude, the listed activities within the stipulated validity period which this Environmental Authorisation is granted for, or this Environmental Authorisation shall lapse and a new application for Environmental Authorisation must be submitted to the competent authority.

This Environmental Authorisation is granted for-

- (a) A period of five (5) years, from the date of issue, during which period the holder must commence with the authorised listed activities.
- (b) A period of ten (10) years, from the date the holder commenced with an authorised listed activity, during which period the authorised listed activities for the construction phase, must be concluded.
- 4. The activities that have been authorised may only be carried out at the site described in Section C above in terms of the approved "Environmental Management Programme" ("EMPr").
- 5. Any changes to, or deviations from the scope of the description set out in Section B and Condition 2 above must be accepted or approved in writing by the competent authority before such changes or deviations may be implemented. In assessing whether to grant such acceptance/approval or not, the competent authority may request such information to evaluate the significance and impacts of such changes or deviations, and it may be necessary for the holder to apply for further authorisation in terms of the applicable legislation.

Notification of authorisation and right to appeal

- 6. The holder of the authorisation must in writing, within 14 (fourteen) calendar days of the date of this decision
 - 6.1 notify all registered Interested and Affected Parties ("I&APs") of -
 - 6.1.1 the outcome of the application;
 - 6.1.2 the reasons for the decision;
 - 6.1.3 the date of the decision; and
 - 6.1.4 the date of issue of the decision;
 - 6.2 draw the attention of all registered I&APs to the fact that an appeal may be lodged against the decision in terms of the National Appeal Regulations, 2014 (as amended);

- 6.3 draw the attention of all registered I&APs to the manner in which they may access the decision; and
- 6.4 provide the registered I&APs with:
 - 6.4.1 the name of the holder (entity) of this Environmental Authorisation;
 - 6.4.2 name of the responsible person for this Environmental Authorisation;
 - 6.4.3 postal address of the holder;
 - 6.4.4 telephonic and fax details of the holder;
 - 6.4.5 e-mail address, if any; and
 - 6.4.6 the contact details (postal and/or physical address, contact number, facsimile and e-mail address) of the decision-maker and all registered I&APs in the event that an appeal is lodged in terms of the National Appeal Regulations, 2014 (as amended).

Commencement

- 7. The listed activities, including site preparation, must not commence within 20 (twenty) calendar days from the date the applicant notified the registered I&APs of this decision.
- 8. In the event that an appeal is lodged with the Appeal Administrator, the effect of this Environmental Authorisation is suspended until such time as the appeal is decided. In the instance where an appeal is lodged the holder may not commence with the activity, including site preparation, until such time as the appeal has been finalised and the holder is authorised to do so.

Written notice to the competent authority

- 9. A minimum of seven calendar days' notice, in writing, must be given to the competent authority before commencement of construction activities. Commencement for the purpose of this condition includes site preparation.
 - 9.1 The notice must make clear reference to the site details and EIA Reference number given above.
 - 9.2 The notice must also include proof of compliance with the following conditions described herein:

Conditions: 6, 7, 14 and 18.1.

Management of activity

- 10. The EMPr submitted, as dated May 2021 is hereby approved and must be implemented.
- 11. An application for amendment of the EMPr must be submitted to the competent authority in terms of Chapter 5 of the EIA Regulations, 2014 (as amended), if any amendments are to be made to the outcomes of the EMPr and these may only be implemented once the amended EMPr has been authorised by the competent authority.
- 12. The EMPr must be included in all contract documentation for all phases of implementation.
- 13. A copy of the Environmental Authorisation and the EMPr must be kept at the site where the listed activities will be undertaken. Access to the site referred to in Section C above must be granted and the Environmental Authorisation and EMPr must be produced to any authorised official representing the competent authority who requests to see these for the purposes of assessing and/or monitoring compliance with the conditions contained herein. The Environmental Authorisation and expression by any employee or agent of the applicant who works performs work at the site.

Monitoring

14. The holder must appoint a suitably experienced Environment Control Officer ("ECO"), for the duration of the construction phase and rehabilitation phases of implementation.

The ECO must-

- 14.1 be appointed prior to commencement of any land clearing or construction activities commencing;
- 14.2 ensure compliance with the EMPr and the conditions contained herein; and
- 14.3 keep record of all activities on site; problems identified; transgressions noted and a task schedule of tasks undertaken by the ECO.

Environmental audit reports

- 15. The holder must, for the period during which the Environmental Authorisation and EMPr remain valid
 - 15.1 ensure that compliance with the conditions of the Environmental Authorisation and the EMPr is audited;
 - 15.2 submit at least two environmental audit reports to the relevant competent authority during the construction phase. The holder must submit one audit report three (3) months after commencement of the construction phase and another audit report six (6) months after completion of the construction phase; and
 - 15.3 submit an environmental audit report every five (5) years while the Environmental Authorisation remains valid.
- 16. The environmental audit report must be prepared by an independent person and must address the objectives and contain all the information set out in Appendix 7 of the EIA Regulations, 2014 (as amended).

In addition to the above, the environmental audit report, must -

- 16.1 provide verifiable findings, in a structured and systematic manner, on-
 - (a) the level of compliance with the conditions of the Environmental Authorisation and the EMPr and whether this is sufficient or not; and
 - (b) the extent to which the avoidance, management and mitigation measures provided for in the EMPr achieve the objectives and outcomes of the EMPr and highlight whether this is sufficient or not;
- 16.2 identify and assess any new impacts and risks as a result of undertaking the activity;
- 16.3 evaluate the effectiveness of the EMPr;
- 16.4 identify shortcomings in the EMPr;
- 16.5 identify the need for any changes to the avoidance, management and mitigation measures provided for in the EMPr;
- 16.6 indicate the date on which the construction work was commenced with and completed or in the case where the development is incomplete, the progress of the development and rehabilitation;
- 16.7 include a photographic record of the site applicable to the audit; and
- 16.8 be informed by the ECO reports.
- 17. The holder must, within 7 days of the submission of the environmental audit report to the competent authority, notify all potential and registered I&APs of the submission and make the report available to anyone on request and, where the holder has such a facility, place on a publicly accessible website.

Specific conditions

- 18. The following recommendations adapted from the Final BAR dated May 2021 compiled by Mr. Anthony Mader of EnviroAfrica cc must be implemented:
 - 18.1 Watercourses and vegetated areas outside of the proposed development footprint must be identified as no-go areas. All no-go areas must be demarcated prior to the commencement of any land clearing or construction activities.
- 19. The following recommendations adapted from the Fresh Water Report dated June 2020 and compiled by watsan Africa must be implemented:
 - 19.1 Measures must be implemented to prevent fill from leaving the construction site.
 - 19.2 The construction footprint must be limited and kept as small as possible.

- 19.3 Over-irrigation must not take place.
- 19.4 Return flow must be pumped back into the dam.
- 20. The River Maintenance Management Plan dated May 2021 and compiled by EnviroAfrica cc is hereby approved and must be implemented.
- 21. Surface or ground water must not be polluted due to any actions on the site. The applicable requirements with respect to relevant legislation pertaining to water must be met.
- 22. An integrated waste management approach, which is based on waste minimisation and incorporates reduction, recycling, re-use and disposal, where appropriate, must be employed. Any solid waste must be disposed of at a waste disposal facility licensed in terms of the applicable legislation.
- 23. Should any heritage remains be exposed during excavations or any actions on the site, these must immediately be reported to the Provincial Heritage Resources Authority of the Western Cape, Heritage Western Cape (in accordance with the applicable legislation). Heritage remains uncovered or disturbed during earthworks must not be further disturbed until the necessary approval has been obtained from Heritage Western Cape. Heritage remains include: archaeological remains (including fossil bones and fossil shells); coins; indigenous and/or colonial ceramics; any articles of value or antiquity; marine shell heaps; stone artifacts and bone remains; structures and other built features; rock art and rock engravings and graves or unmarked human burials.

A qualified archaeologist must be contracted where necessary (at the expense of the applicant and in consultation with the relevant authority) to remove any human remains in accordance with the requirements of the relevant authority.

F. GENERAL MATTERS

- 1. Notwithstanding this Environmental Authorisation, the holder must comply with any other statutory requirements that may be applicable when undertaking the listed activities.
- 2. Non-compliance with a condition of this Environmental Authorisation or EMPr may render the holder liable to criminal prosecution.
- 3. If the holder does not commence with the listed activities within the period referred to in Condition 2, this Environmental Authorisation shall lapse for those activities, and a new application for Environmental Authorisation must be submitted to the Competent Authority. If the holder wishes to extend the validity period of the Environmental Authorisation, an application for amendment in this regard must be made to the Competent Authority prior to the expiry date of the Environmental Authorisation.
- 4. The holder must submit an application for amendment of the Environmental Authorisation to the Competent Authority where any detail with respect to the Environmental Authorisation must be amended, added, substituted, corrected, removed or updated. If a new holder is proposed, an application for Amendment in terms of Part 1 of the NEMA EIA Regulations, 2014 (as amended) must be submitted.

Please note that an amendment is not required if there is a change in the contact details of the holder. In this case, the Competent Authority must only be notified of such changes.

5. The manner and frequency for updating the EMPr is as follows: Amendments to the EMPr must be done in accordance with Regulations 35 to 37 of the NEMA EIA Regulations, 2014 (as amended) or any relevant legislation that may be applicable at the time.

G. RECOMMENDATIONS

By facsimile:

- Water should not be abstracted from the Berg River during the drier summer months.
- Construction should take place during the dry season in summer.

H. APPEALS

Appeals must comply with the provisions contained in the National Appeal Regulations, 2014 (as amended).

- 1. An appellant (if the holder of the decision) must, within 20 (twenty) calendar days from the date notification of the decision was sent to the holder by the competent authority -
 - 1.1 Submit an appeal in accordance with Regulation 4 of the National Appeal Regulations, 2014 (as amended) to the Appeal Administrator; and
 - 1.2 Submit a copy of the appeal to any registered Interested and Affected Parties, any Organ of State with interest in the matter and the decision-maker *i.e.*, the competent authority that issued the decision.
- 2. An appellant (if NOT the holder of the decision) must, within 20 (twenty) calendar days from the date the holder of the decision sent notification of the decision to the registered Interested and Affected Parties -
 - 2.1 Submit an appeal in accordance with Regulation 4 of the National Appeal Regulations, 2014 (as amended) to the Appeal Administrator; and
 - 2.2 Submit a copy of the appeal to the holder of the decision, any registered Interested and Affected Party, any Organ of State with interest in the matter and the decision-maker *i.e.*, the competent authority that issued the decision.
- 3. The holder of the decision (if not the appellant), the decision-maker that issued the decision, the registered Interested and Affected Party and the Organ of State must submit their responding statements, if any, to the appeal authority and the appellant within 20 (twenty) calendar days from the date of receipt of the appeal submission.
- 4. The appeal and the responding statement must be submitted to the address listed below:

By post:	Attention: Marius Venter Western Cape Ministry of Local Government, Environmental Affairs and Development Planning Private Bag X9186 CAPE TOWN
	8000

By hand: Attention: Mr Marius Venter (Tel: 021 483 3721) Room 809 8th Floor Utilitas Building, 1 Dorp Street, Cape Town, 8001

(021) 483 4174; or

Note: For purposes of electronic database management, you are requested to submit electronic copies (Microsoft Word format) of the appeal, responding statement and any supporting documents to the Appeal Authority to the address listed above and/ or via e-mail to <u>DEADP.Appeals@westerncape.gov.za</u>.

 A prescribed appeal form as well as assistance regarding the appeal processes is obtainable from the Appeal Authority at: Tel. (021) 483 3721, E-mail <u>DEADP.Appeals@westerncape.gov.za</u> or URL <u>http://www.westerncape.gov.za/eadp</u>.

I. DISCLAIMER

The Western Cape Government, the Local Authority, committees or any other public authority or organisation appointed in terms of the conditions of this environmental authorisation shall not be responsible for any damages or losses suffered by the holder, developer or his/her successor in any instance where construction or operation subsequent to construction is temporarily or permanently stopped for reasons of non-compliance with the conditions as set out herein or any other subsequent document or legal action emanating from this decision.

Your interest in the future of our environment is appreciated.

Yours faithfully

MR. ZAAHIR TOEFY DIRECTOR: DEVELOPMENT MANAGEMENT (REGION 1)

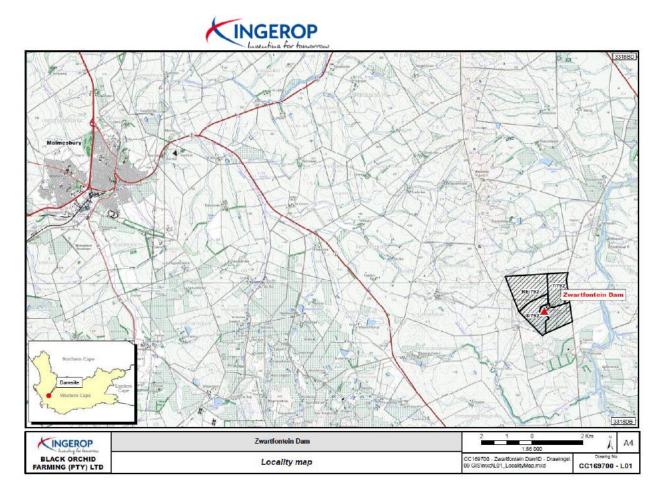
DATE OF DECISION: 13 SEPTEMBER 2021

Copied to: (1) Mr. A Mader / Mr. C Clinton Geyser (EnviroAfrica) (2) Mr. A Zaayman (Swartland Municipality) E-mail: <u>anthony@enviroafrica.co.za</u> / <u>clinton@enviroafrica.co.za</u> E-mail: <u>swartlandmun@swartland.org.za</u>

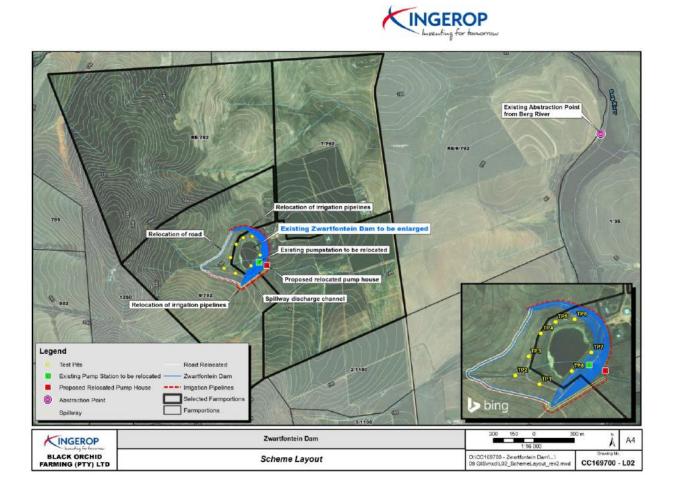
FOR OFFICIAL USE ONLY:

EIA REFERENCE NUMBER: 16/3/3/1/F5/16/2002/21 NEAS REFERENCE: WCP/EIA/0000859/2021

ANNEXURE 1: LOCALITY MAP



ANNEXURE 2: THE SITE DEVELOPMENT PLAN



ANNEXURE 3: REASONS FOR THE DECISION

In reaching its decision, the Competent Authority considered, inter alia, the following:

- a) The information contained in the Application Form received by this Department on 11 January 2021, the Final BAR, the EMPr dated May 2021 and the additional information received from Mr. Clinton Geyser of EnviroAfrica on 2 September 2021.
- b) Relevant information contained in the Departmental information base, including the Guidelines on Public Participation, Alternatives (dated March 2013);
- c) The objectives and requirements of relevant legislation, policies and guidelines, including Section 2 of the NEMA;
- d) A site inspection took place on 15 January 2020, as attended by officials of this Department, the applicant, representatives of EnviroAfrica CC as well as Ingeprop; and
- e) The comments received from I&APs and responses to these, included in the Final BAR.

All information presented to the Competent Authority was taken into account in the consideration of the application for Environmental Authorisation. A summary of the issues that were considered to be the most significant for the decision is set out below.

1. Public Participation

The public participation process included:

- notifications regarding the proposed development were distributed to all relevant I&APs as well as key authorities;
- maildrops were distributed to all relevant I&APs;
- an advertisement was placed in the 'Swartland' newspaper on 26 March 2019;
- notices were placed around the site as well as other strategic locations, including the Du Vlei Farmstall, Die Rooi Spens Café in Hermon, Agrimark in Wellington and the Midway Superette, in Wellington; and
- copies of the reports were circulated to all I&APs and key authorities for comment.

This Department is satisfied that the Public Participation Process that was followed met the minimum legal requirements. All the comments and responses made were included in the BAR.

2. Alternatives

Location alternative in terms of Zwartfontein dam (Preferred by the applicant):

This alternative entails the expansion of the existing dam on the Remainder of Farm Zwartfontein No. 792 and Portion 8 of the Farm Zwartfontein No. 792, Malmesbury. The location alternative is preferred as it is where the existing dam is located which needs to be expanded.

Locality Alternative A in terms of the Pumpstation relocation (Preferred by the applicant):

This alternative entails the relocation of the pumpstation to approximately 65m South West downstream of the raised dam wall on the northern bank of the drainage line/stream. This location alternative is preferred as water will flow from the dam to the pumphouse via gravitation and thereby resulting in saving in energy costs.

Locality Alternative A in terms of the Compost storage facility (Preferred by the applicant):

This alternative entails the construction of a compost storage facility next to an existing house on the property. The facility will store approximately 80m³ of compost and have a footprint of approximately 100m². The pumpstation and compost tanks will be connected via a new pipeline. This location alternative is preferred as it allows for ease of access for large delivery trucks delivering compost.

Locality Alternative B in terms of the Pumphouse components (Not Preferred by the applicant):

This alternative entailed the relocation and construction of the compost storage facility next to the proposed new pumphouse, downstream of the raised dam wall on the northern bank of the drainage line/stream. This location alternative was rejected as the impact on the environment and drainage line would be more significant. This is due to no access roads to the proposed site that could be used by delivery trucks. A road will therefore have to be constructed resulting in disturbance and associated environmental impacts.

Location Alternative A in terms of the Irrigation Infrastructure (Preferred by the applicant):

This alternative entails the relocation and extension of irrigation pipelines to connect to existing irrigation pipelines. The new pipeline will vary from approximately 110mm to 250 mm in width and approximately 1150m in length. The new pipelines will be installed in ploughed land and is therefore preferred.

Locality Alternative A in terms of the Eskom infrastructure (Preferred by the applicant):

This alternative entails the relocation of the existing Eskom electrical infrastructure located directly below the existing dam embankment wall to downstream of the raised dam wall footprint. The relocation activities will be done in accordance with the requirements of Eskom. This alternative is preferred as it allows for infrastructure to be relocated so that the downstream increase of the dam wall can take place, as proposed.

Locality Alternative A in terms of the constructed access road (Preferred by the applicant): This alternative entails the construction of an approximate 10m wide and 1600m long access road around the dam footprint. This alternative is preferred as a new access road is required since the old access roads around the existing dam will be inundated due to the enlargement of the dam.

Layout/Design Alternative A: Option 10 (Preferred by the applicant and herewith authorised): This alternative entails the expansion of the Zwartfontein dam to comprise the following design dimensions:

Layout/Design Alternative A is preferred as the abovementioned dimensions provides the target storage capacity which is in accordance with the applicant's storage demand.

Technology alternatives (Preferred by the applicant):

The type of irrigation methods was considered, with drip irrigation being the preferred method and alternative due to the benefit of saving water.

Technology alternatives associated with the location of the new pump house were considered, with the pumphouses location being preferred based on its gravitational benefits. This implies that water will not have to be pumped from the dam to the pumphouse from but will flow via gravity and reducing energy cost. It is for such reasons that this option is preferred.

No-go alternative (rejected by the applicant):

The no-go alternative entails no dam expansion nor the installation and construction of the associated infrastructure and new access road. This alternative was rejected as insufficient dam storage capacity will persist which means less water will be available for irrigation purposes.

3. Impact Assessment and Mitigation measures

3.1 Activity need and desirability

The proposed dam expansion is required to store water to be used to improve the existing productive hectares of the farm's agricultural output. This will also lead to the creation a sustainable citrus and grape operation resulting in over 200 new employment opportunities while retaining over 600 existing jobs.

Due to the absence of rainfall during mid-summer when water is required (which is generally too little to sustain agricultural activities), water is generally abstracted during winter and subsequently stored in dams for irrigation during the summer months. The proposed increase in the dam's storage capacity is required to secure water for use during dry summer seasons.

Ultimately, the proposed development is required to ensure the long-term economic viability and sustainability of the existing production of table grapes and citrus as well as the employment it provides.

3.2 Regional/Planning Context

The site is zoned as Agriculture and as such, the proposed development is permitted in terms of the existing land use rights.

Sustainable agricultural developments are generally promoted for the Swartland region in terms of the forward planning context, as agriculture is a main economic driver in the Swartland Municipal region. The proposed development is therefore consistent with this context in this regard.

3.3 Biophysical Impacts

A Botanical Statement was compiled by PB Consult dated February 2021, given that the site historically supported Swartland Shale Renosterveld and based on google earth imagery, the site appears to support indigenous vegetation. It was concluded that the site is degraded to a large extent and no longer in a natural or near natural condition as a result of historical agricultural practices. Only a few indigenous species remain. The proposed development is therefore not expected to have any significant long-term impacts on vegetation.

A Freshwater Assessment Report dated June 2020 was compiled by watsan AFRICA to assess the freshwater impacts associated with the proposed expansion of the dam. The drainage line to be affected by the dam expansion is overgrown with reeds and is considered as transformed and degraded. The drainage line therefore has an extensive loss of habitat, biota and ecosystem functioning. The drainage line is also devoid of permanent water flow. The drainage line is not deemed as ecologically important and is also unlikely to recover from this state.

The risk of more agricultural return flow impacting the river system is considered to be low, as the local drainage lines have already been transformed into stormwater management systems. The return flows and the enlargement of the dam will therefore not add to these impacts.

An existing water use license is in place and no new water will be abstracted. Instead, the expanded dam will be filled from an existing abstraction point (which will remain as is) with existing water use rights enlisted under the Berg River Irrigation Board.

Direct negative impacts on water or botanical resources are unlikely as the proposed dam expansion and the associated activities will take place in the transformed sections of the site, while the drainage line itself not being ecologically sensitive. However, to further reduce the likelihood of the proposed development having any negative impacts on the drainage line and the associated aquatic elements, mitigation measures have been proposed as part of the Freshwater Assessment Report dated June 2020 as well as the Botanical Statement dated 16 February 2021, which were included in the EMPr. A River Maintenance Management Plan (dated May 2021) was also compiled which further contains implementable measures to prevent avoidable damage to the aquatic habitat associated with the proposed dam expansion while also enhancing the positive benefits of the proposed development.

According to the Engineers Technical Report dated 1 November 2019 as compiled by Ingeprop, the on-site test pits excavated revealed that the available materials found are adequate core material required for the dam expansion. As such, materials (core and general fill) for the raising of the embankment is proposed to be excavated from the dam basin, while filter material for chimney and blanket drain (sand), rock toe and rip-rap for upstream slope protection will be imported from commercial sources.

3.4 Agricultural impacts

Although approximately 4.5ha of Agricultural land (orchards) will be lost due to the proposed enlargement of the Zwartfontein Dam, the preferred layout meets the applicant's target storage capacity and storage demand for the irrigation of existing orchards and thereby sustaining the existing operations on the farm.

3.5 Visual/Sense of place

The site is largely surrounded by agricultural activities and will therefore not be "out of character" and is expected to have a negligible impact on the visual character of the immediate area and its surrounds.

3.6 Heritage

No impact on heritage resources is expected due to the past and current agricultural activities on the farm and surrounds. The Heritage Western Cape confirmed in their correspondence dated 30 April 2019, 25 November 2019 and 31 March 2021 that the proposed development is not expected to have impacts on heritage resources.

3.7 Socio-economic

The increased water supply for irrigation of cultivated areas will secure jobs and increase agricultural production on the farm.

The development will result in both negative and positive impacts.

Negative Impacts:

- The loss of indigenous vegetation.
- Loss of some agricultural land.
- Impacts on the stream located within the proposed dam expansion footprint.

Positive impacts:

- Sustaining existing employment on the farm and additional employment opportunities will be created during the development phase.
- Sufficient dam capacity to store water for irrigation purposes in the summer months.
- Contribution to the local economy.

4. National Environmental Management Act Principles

The National Environmental Management Principles (set out in section 2 of the NEMA, which apply to the actions of all organs of state, serve as guidelines by reference to which any organ of state must exercise any function when taking any decision, and which must guide the interpretation, administration and implementation of any other law concerned with the protection or management of the environment), inter alia, provides for:

- the effects of decisions on all aspects of the environment to be taken into account;
- the consideration, assessment and evaluation of the social, economic and environmental impacts of activities (disadvantages and benefits), and for decisions to be appropriate in the light of such consideration and assessment;
- the co-ordination and harmonisation of policies, legislation and actions relating to the environment;
- the resolving of actual or potential conflicts of interest between organs of state through conflict resolution procedures; and
- the selection of the best practicable environmental option.

5. Conclusion

In view of the above, the NEMA principles, compliance with the conditions stipulated in this Environmental Authorisation, and compliance with the EMPr, the Competent Authority is satisfied that the proposed listed activities will not conflict with the general objectives of integrated environmental management stipulated in Chapter 5 of the National Environmental Management Act, 1998 (Act No. 107 of 1998) and that any potentially detrimental environmental impacts resulting from the listed activities can be mitigated to acceptable levels.

You are reminded of your general duty of care towards the environment in terms of Section 28(1) of the NEMA which states: "Every person who causes, has caused or may cause significant pollution or degradation of the environment must take reasonable measures to prevent such pollution or degradation from occurring, continuing or recurring, or, in so far as such harm to the environment is authorised by law or cannot reasonably be avoided or stopped, to minimise and rectify such pollution or degradation of the environment."

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