



water affairs

Department:
Water Affairs
REPUBLIC OF SOUTH AFRICA

MINISTRY OF WATER AND
ENVIRONMENTAL AFFAIRS

15:23 2010-08-03

PRIVATE BAG X313
PRETORIA 0001 AN

Enquiries: J van Aswegen
Telephone: 013-759 7490
Reference: 6/2/2/6

MINISTER OF WATER AND ENVIRONMENTAL AFFAIRS

NATIONAL ASSEMBLY: QUESTION 1699 FOR WRITTEN REPLY

A draft reply to the above-mentioned question asked by Mr G R Morgan (DA); is attached for your consideration.


DIRECTOR-GENERAL (Acting)

DATE: 3/6/10


DRAFT REPLY APPROVED/AMENDED


MS B P SONJICA, MP
MINISTER OF WATER AND ENVIRONMENTAL AFFAIRS

DATE: 06/04/2010

NATIONAL ASSEMBLY

FOR WRITTEN REPLY

QUESTION NO 1699

DATE OF PUBLICATION IN INTERNAL QUESTION PAPER: 28 MAY 2010
(INTERNAL QUESTION PAPER NO. 15)

1699. Mr G R Morgan (DA) to ask the Minister of Water and Environmental Affairs:

- (1) (a) What is the state of the water quality in the Loskop Dam as at the latest specified date for which information is available and (b) what are the sources of pollution in the dam;
- (2) whether cyanobacteria has been identified as a problem in the dam; if not, what is the basis for this conclusion; if so, what are the relevant details;
- (3) whether the water leaving the dam is suitable for downstream agriculture; if not, what is the basis for this conclusion; if so, how was this conclusion reached;
- (4) whether her department has taken any measures to improve the water quality of the dam; if not, why not; if so, what are the relevant details;
- (5) whether any (a) notices of intention to issue directives, (b) directives or (c) criminal charges have been issued against upstream polluters of the dam; if not, why not; if so, what are the relevant details?

NW1965E

---00000---

REPLY:

- (1)(a) There has been a marked increase in nutrient enrichment (phosphorus and Nitrogen compounds) since 2005. These lead to significant eutrophication related problems within the reservoir as previously observed (i.e. fish and crocodile deaths). Chlorophyll a concentrations peaked during summer periods of 2004/5 and there is a significant increase since the winter of 2007. However, the mean chlorophyll a concentrations are still within limits (i.e. below 30µg/l). The mean total phosphorus concentration of 0.041mg/l provides a moderate potential for eutrophication problems to arise. The mean chlorophyll a concentration of 4.42µg/l is indicative of an oligotrophic system.

Statistical results for water quality attributes for irrigated agricultural and domestic uses were all within targeted range (very good to good) with the exception of Ammonium (fair range). For the water quality attributes analysed, other than for Ammonium and fluoride for domestic use, it would not appear that the water quality during the period analysed would not represent any cause for concern. Some taste and odour problems could have been detected when the ammonium levels were at their higher levels. Some tooth staining can be expected at the highest concentrations.

- (1)(b) Sources of pollution affecting the dam include amongst others; point sources such as Municipal wastewater treatment works and non point sources such as mines, tourism facilities and agriculture.

- (2) Cyanobacteria are present in Loskop Dam but it is not currently considered as a problem because of the levels of bacteria present.
- (3) Yes, the parameters are monitored and meet the target water quality range for downstream agriculture being practiced around the area in question.

Due to the pollution threats, there is a high priority within my Department to monitor the water quality as concerns have been raised by water users downstream. As indicated in paragraph (1)(a) above; water quality attributes for irrigated agricultural use were within the water quality range, which was also the same downstream of the dam.

- (4) Yes, my Department is addressing the water quality at the dam by introducing the Blue Drop Green Drop incentives for the municipality to comply with acceptable discharge standards.

Further, my Department has developed the following:

- Resource directed strategy to ensure that point sources of pollution are addressed and include aspects such as licensing (with specific conditions to the specific users for compliance).
- Resource directed measures which include amongst others the determination of the reserve in support of licenses, establishment of forums and initiatives (e.g. River Health Programme) where water users participate to influence the management and operations of river systems.
- Water Quality Management Plan which set the objectives for various elements which should be achieved by various water use sectors.

- (5)(a) Yes, Table 1 below reflects the notices issued.

Table 1: Notices issued

Notice	Section	Date issued
Delmas Local Municipality (LM)	19 (Pollution prevention)	10/02/2009
Department of Public Works	19 (Pollution prevention)	14/04/2010
Doornrug	19 (Pollution prevention)	28/10/2009
Emalahleni LM	19 (Pollution prevention)	08/04/2009
		13/10/2009
		19/11/2009
		13/04/2009
Govan Mbeki LM	19 (Pollution prevention)	08/04/2009
		27/02/2010
		13/04/2010
Kungwini LM	19 (Pollution prevention)	05/06/2009
Leeuwpan Coal	19 (Pollution prevention)	09/10/2009
Rietvallei Meat Marketers	19 (Pollution prevention)	30/03/2009
Vuna Coal Holdings	19 (Pollution prevention)	02/08/2009

(5)(b) Yes, Table 2 below reflects the notices issued.

Table 2: Directives issued

Directive issued to	Section	Date issued
Arnot Colliery	19 (Pollution prevention) and 20 (Emergent incident)	23/03/2006
Arnot opencast mine	19 (Pollution prevention) and 20 (Emergent incident)	10/04/2006
Clewer	19 (Pollution prevention)	20/04/2006
Emalahleni LM	19 (Pollution prevention)	27/10/2009
Kanhym Estate	19 (Pollution prevention)	16/08/2007
Kriel Power Station	20 (Emergency incident)	10/12/2009
Rietvallei Meat Marketers	19 (Pollution prevention)	13/05/2010
Optimum Colliery	19 (Pollution prevention)	09/06/2006
Woestallen Colliery	19 (Pollution prevention)	20/06/2006

(5)(c) Yes, criminal case have been opened with the Delmas and Emalahleni South African Police Services (SAPS) against MPC Chicks and Emalahleni LM (case numbers 15/03/2009 and 858/11/2009) respectively.

---00000---