



water & forestry

Department:
Water Affairs and Forestry
REPUBLIC OF SOUTH AFRICA

Enquiries: M J Kadiaka
Telephone: 013-759-7313
Reference: 6/2/2/6

MINISTER OF WATER AND ENVIRONMENTAL AFFAIRS

NATIONAL ASSEMBLY: QUESTION 118 FOR WRITTEN REPLY

A draft reply to the above-mentioned question asked by Ms A.T Lovemore (DA), is attached for your consideration, please.

DIRECTOR-GENERAL

DATE: 08/07/09

DRAFT REPLY APPROVED/ AMENDED

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

DATE: 09. 07. 14

NATIONAL ASSEMBLY

FOR WRITTEN REPLYQUESTION NO 118

DATE OF PUBLICATION IN INTERNAL QUESTION PAPER: 12 JUNE 2009
(INTERNAL QUESTION PAPER NO 2)

118. Ms A T Lovemore (DA) to ask the Minister of Water and Environmental Affairs:

- (1) Whether, any steps have been taken to prevent raw sewage from entering certain rivers (names furnished); if not, why not; if so, what steps;
- (2) whether the levels of faecal pollution in the rivers are regularly monitored; if not, why not; if so, what were the results of this monitoring over the past three months for which information is available;
- (3) whether the high levels of faecal pollution pose a risk to (a) the animals and (b) the flora in the Kruger National Park; if not, what scientific rationale has been used to reach this conclusion; if so, what are the relevant details?

NW126E

---0000---

REPLY:

(NOTE: names furnished in (1) = the Crocodile, Sabie, Sand, Olifants, Letaba, Shingwedzi and Luvuvhu rivers)

- (1) Yes, enforcement steps have been taken to prevent raw sewage from entering the rivers referred to above as well as others. Regular site inspections are conducted at hotspot sites to verify if there are no spillages as they are not always reported. Treatment of raw sewage falls within the ambit of water services and is the responsibility of municipalities that are designated as Water Services Authorities.

14 Water Services Authorities have been issued with Notices by this Department in terms of the National Water Act, Act no 36 of 1998 to prevent pollution of water resources and three were issued with directives. The recent details of these steps are indicated below:

Affected River	Details	Status
Crocodile	Notice in terms of Section 19(3) issued to the Nkomazi Municipality for the overflow of raw sewage from the Komati Pump Station.	Action plan awaited from municipality.
Olifants	Notice in terms of Sections 19(3) and 53(1) issued to the Delmas Municipality for discharge of poor quality effluent into Bronkhorstspuit River and operating	An action plan was received from the municipality in terms of how the issues are to be addressed. A consultant has already been

Affected River	Details	Status
	with expired license.	appointed to facilitate a water use license application and new sewage treatment works. The Department will be conducting follow-up inspections.
Elands-tributary of the Crocodile	Notice in terms of Section 19(3) to the Emakhazeni Municipality for the overflow of raw sewage into Eefues River from the Machadodorp Pump Station.	The Department is awaiting an action plan from the municipality. Concurrently, routine audits are being conducted.
Olifants	Section 19(3) Directive issued to the Emalahleni Municipality for the overflow of Bankenveld Pump station.	The municipality has presented a draft action plan and a budget to refurbish all sewage treatment works and construction of new sewage treatment works. The Department has accepted the plan and implementation of the action plan is being monitored.
Sabie	Notice in terms of Sections 19(3) and 53(1) issued to the Bushbuckridge Municipality for discharging effluent of poor quality into the river and operating sewage works without a license.	The municipality has submitted an action plan. The implementation of the action plan is being monitored.
Sabie	Notice in terms Section 53(1) issued to the Thabachweu Municipality for failure to comply with license conditions for Lydenburg Sewage Treatment Works.	Following the issuing of the Notice, corrective action has been taken and reasons for non-compliance were indicated. Water quality results have shown improvement and the routine audit will be conducted.
Crocodile	Notice in terms of Sections 19(3) and 53(1) issued to the Mbombela Municipality for discharging effluent of poor quality into the river from White River STW and non compliant to wastewater general standards.	The municipality responded to the notice but submitted an action plan without timeframes. A response letter requesting timeframes was written to the municipality and a response is awaited.
Olifants	Notice in terms of Sections 19(3) and 53(1) issued to the Govan Mbeki Municipality for the discharge of poor quality effluent into the River and operating sewage works without license.	The Department is awaiting an action plan from the municipality.
Olifants	Notice in terms of Section 19(3) issued to the Kungwini Municipality for the alleged sewage pollution at the Bronkhorstspruit River.	The Department is awaiting an action plan from the municipality.
Olifants	Notice in terms of Section 53(1) issued to the Greater Sekhukhune Municipality for operating the Groblersdal sewage treatment works without a valid license.	The Department is awaiting an action plan from the municipality.

Affected River	Details	Status
Sand River & Levuvhu River	Notice in terms of section 74 issued to Vhembe District Municipality and Public Works.	The Department is awaiting an action plan from the municipality.
Groot Letaba River	Notice in terms of section 19 issued to the Greater Tzaneen Municipality.	Following the court interdict issued to the illegal residents, a Letaba River Bank committee was formed to continuously monitor the area.
Shingwedzi River	Notice in terms of section 19 issued to Kruger National Park.	Resolved- the broken pipe has been repaired.

- (2) Yes, the level of faecal pollution in the Rivers is monitored regularly (at least once in a month) per monitoring point.

The results for the recent 3 months are as follows:

- **Crocodile river**

Upstream point at Dullstroom

Month	<i>E. Coli</i> (cfu/100ml)	Total Coliforms (cfu/100ml)
Mar-09	0	552
Apr-09	0	100
May-09	0	128

Downstream point before the confluence with the Komati River

Month	<i>E. Coli</i> (cfu/100ml)	Total Coliforms (cfu/100ml)
Mar-09	0	>1000
Apr-09	0	>1000
May-09	100	400

- **Sand river**

Upstream point at Groot Sand

Month	<i>E. Coli</i> (cfu/100ml)	Total Coliforms (cfu/100ml)
Mar-09	16	1000
Apr-09	0	1000
May-09	200	1000

Downstream point at Sand River

Month	<i>E. Coli</i> (cfu/100ml)	Total Coliforms (cfu/100ml)
Mar-09	>1000	>1000
Apr-09	Data not available	200
May-09	200	>1000

- **Sabie River**

Upstream point (at Sawmill)

Month	E. Coli (cfu/100ml)	Total Coliforms (cfu/100ml)
Feb-09	0	>1000
Mar-09	206	>1000
Apr-09	36	>1000

Downstream point (before Kruger National Park)

Month	E. Coli (cfu/100ml)	Total Coliforms (cfu/100ml)
Jan-09	727	>2420
Feb-09	0	>1000
Mar-09	>1000	>1000

- **Upper Olifants**

Downstream point at Groblersdal

Month	E. Coli (cfu/100ml)	Total Coliforms (cfu/100ml)
Jan-09	18	>2420
Feb-09	Data not available	Data not available
Mar-09	0	Data not available

Upstream point at Riverview

Month	E. Coli (cfu/100ml)	Total Coliforms (cfu/100ml)
Mar-09	Data not available	Data not available
Apr-09	712	>1000
May-09	Data not available	Data not available

- **Groot Letaba River**

Tzaneen Taxi Rank

Month	E. coli	Faecal Coliform
26 /02/ 2009	1200	2400
26/03/2009	87 000	290 000
30/04/2009	2070	2300

Upstream Tzaneen Sewage Works

Month	E. coli	Faecal Coliform
26/02/2009	3290	4700
26/03/2009	2720	3400
30/04/2009	8400	12 000

Downstream Tzaneen Sewage Works

Month	E. coli	Faecal Coliform
26/02/2009	760	1900
26/03/2009	66	220
30/04/2009	?	?

Letaba Hospital Bridge

Month	E. coli	Faecal Coliform
26/02/2009	36	120
26/03/2009	0	4500
30/04/2009	420	420

- Levuvhu River**

Upstream Thohoyandou Sewage Works

Month	E. coli	Faecal Coliform
26/02/2009	4900	7000
26/03/2009	1300	1300

Thohoyandou Sewage Works (Mvudi River into Levuvhu Tributary)

Month	E. coli	Faecal Coliform
26/02/2009	5250	10700
26/03/2009	0	2

Nooitgedacht 14LT Levuvhu Weir in Levuvhu Farms on Levuvhu River

Month	E. coli	Faecal Coliform
26/02/2009	23	25

Klein Australie 13LT Weir on Lotanyowa River before Tshaluma Village

Month	E. coli	Faecal Coliform
26/02/2009	2720	3400

- Shingwedzi River**

Downstream Malamulele Sewage Works

Month	E. coli	Faecal Coliform
23/01/2009	200	500
26/02/2009	440	1100
14/04/2009	80	81

Kruger National Park (Letaba Camp Oxidation Pond)

Month	E. coli	Faecal Coliform
23/01/2009	9	10

Kruger National Park (Olifants Camp Oxidation Pond)

Month	E. coli	Faecal Coliform
23/01/2009	0	0

- (3)(a) No adverse effects are likely to manifest for mature livestock based on the current results, whereas there might be significant risk of infection for young livestock for monitoring points where less than 20% of the samples had a range of between 1000 – 5000 cfu/100ml faecal coliform.

The scientific rationale is derived from the South African Water Quality Guidelines, Volume 5, Agricultural use: Livestock watering, second edition, 1996 (only refers to livestock watering, poultry and swine). This guideline is being used for the assessment of whether the measured faecal pollution might pose a risk to livestock (i.e. animals).

- (3)(b) The risk to the flora cannot be ascertained as the guidelines used for data interpretation do not directly relate to the flora in the park, but only relates to aquatic ecosystems. Thus, research still needs to be done to assess the impact of varied levels of faecal pollution on the flora in the park.