Support to the Continuation of the Reconciliation Strategy of the KwaZulu-Natal Coastal Metropolitan Area: Phase 2

Minutes of the Strategy Steering Committee Meeting No. 7

Wednesday, 25 February 2015, 10:00 – 14:00 Durban Jewish Centre, Durban North

ITEM ACTION

1. WELCOME

1.1 Introductory Remarks from the Chairperson

Mr Mabuda welcomed all Strategy Steering Committee (SSC) members to the meeting. As a way of introduction, he mentioned the following:

- The SSC meets every 6 months to review and monitor progress on the *Reconciliation Strategy of the KwaZulu-Natal Coast Metropolitan Area*.
- This is important to ensure that the Strategy is implemented in a coordinated way and remains relevant.

1.2 Welcoming Remarks from the KZN Regional Office

In the absence of Mr Ashley Starkey, Chief Director (KwaZulu-Natal Region Office), Ms Angela Masefield welcomed all present on behalf of the Department of Water and Sanitation (DWS). She mentioned that the SSC meeting is happening at the time when the Department was facing a number of challenges related to drought situation in the province (as discussed under **Item 6**). The Premier of KwaZulu-Natal declared the recent drought as a Provincial Disaster. She requested SSC members to note that there are a number of interventions that are being implemented by the Department, in consultation with the municipalities, to deal with the situation. She requested members to work together with the Department in this regard.

She thanked SSC members for their continued participation and support in the Reconciliation Strategy of the KZN Coastal Metropolitan Area.

Note: It was noted that Mr Starkey would be joining the meeting a bit later and for a brief period as he was attending another DWS meeting.

2. ATTENDANCE & APOLOGIES

Mr Mabuda requested all SSC members to introduce themselves, the organisations they represent and to submit apologies for the record, if any.

2.1 Attendance

The following SSC members were in attendance (listed alphabetically according to surname):

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No.	Name	Organisation
1	Mr Bryan Ashe	GeoSphere
2	Mr Kobus Bester	DWS
3	Prof Chris Buckley	University of KwaZulu-Natal
4	Ms Lungile Cele	Ugu District Municipality
5	Mr Gerald de Jager	AECOM
6	Ms Erna du Plessis	Dube TradePort
7	Prof Anthony Forbes	Marine and Estuarine Research
8	Mr Paul Herbst	DWS
9	Mr Wade Holland	Mdloti Catchment Forum and Coastwatch
10	Ms Hope Joseph	eThekwini Metropolitan Municipality
11	Mr Livhuwani Mabuda	DWS
12	Ms Angela Masefield	DWS
13	Mr Kevin Meier	Umgeni Water
14	Mr Sibusiso Mjwara	uMgungundlovu District Municipality
15	Ms Salona Moodley	DWS
16	Dr Beason Mwaka	DWS
17	Ms Shane Naidoo	DWS
18	Mr Tendani Nditwani	DWS
19	Mr Ben Ngcobo	Harry Gwala District Municipality
20	Mr Bill Pfaff	eThekwini Metropolitan Municipality
21	Ms Hermien Pieterse	AECOM
22	Ms Renelle Karen Pillay	DWS
23	Mr Jonathan Schroder	AECOM
24	Mr Simon Scruton	eThekwini Metropolitan Municipality
25	Mr Michael Singh	DWS
26	Ms Bongi Shinga	AECOM
27	Ms Bhavna Soni	eThekwini Metropolitan Municipality
28	Mr Ashley Starkey	DWS
29	Mr Mahlodi Tau	South African National Biodiversity Institute
30	Ms Bathandwa Vazi	South African Local Government Association
31	Mr Niel van Wyk	DWS
32	Mr Pieter Viljoen	DWS
33	Mr Norman Ward	DWS
34	Mrs Barbara Weston	DWS
35	Mr Kennedy Mandaza	DWS

2.2 Apologies

The following apologies were received:

No.	Name	Organisation
1	Mr Rod Bulman	CoastWatch - KZN
2	Ms Nicolette (Nicky) Forbes	Marine and Estuarine Research
3	Mr Kurt Fortuin	DWS
4	Mr Johan Fourie	DWS
5	Mr Steve Gillham	Umgeni Water
6	Dr Marilyn Govender	South African Sugar Association
7	Mr Mike Greatwood	Msunduzi Local Municipality
8	Mr Geert Grobler	DWS
9	Mr Haroon Karodia	Dept of Agriculture and Environmental Affairs, KZN
10	Mr Jaap Kroon	DWS
11	Ms Khumbuzile Moyo	DWS
12	Mr Speedy Moodliar	eThekwini Metropolitan Municipality
13	Ms Celiwe Ntuli	DWS
14	Dr Johan van der Walt	Ugu District Municipality

3. APPROVAL OF THE AGENDA

The agenda was approved without any changes.

4. MINUTES OF PREVIOUS MEETING

4.1 Minutes of Previous Meeting

Page 7, Item 8.1.3 (a) - Prof Forbes suggested that the wording be corrected as follows:

"Ms Forbes raised her concerns regarding the environmental and social impacts of the proposed Smithfield Dam on the uMkhomazi river and estuary as the latter in particular offers significant ecological and environmental services to the coastal environment. She stated that she is aware that Ms Shane Naidoo is busy with the Classification Study for the Mvoti to Umzimkulu WMA, which includes the uMkhomazi. A major concern is that sediments are investigated as part of the Classification Study as the Smithfield Dam stands to have a significant impact on the transport of sediments through the river and estuary and ultimately to the beaches north of the Mkhomazi where they compensate for long shore drift. She requested more clarity on the scope of the EIA for the dam."

Minutes were then accepted with the above-mentioned changes.

4.2 Matters arising (not covered in the Agenda)

Actions arising from the minutes of SSC Meeting No. 6 (24 July 2014) and the applicable status were presented as pages 3 and 4 of the Agenda (distributed to all SSC members).

(a) Mr Bryan Ashe pointed out that, at the previous meeting, he had requested that there should be a stakeholder report back from the DWS Regional Office.

Response: Mr van Wyk acknowledged Mr Ashe's previous request. He further indicated that DWS appreciates and wants to work with organisations like GeoSphere. He then indicated that the Agenda already addresses items relating to the drought situation and other issues Mr Ashe had requested to be included.

(b) Mr Ashe followed up on Mr van Wyk's response indicating that the report back session should be aimed at providing feedback on numerous other programmes and processes, e.g. the Catchment Management Agency, water quality monitoring, etc. He added that it is essential people fully understand the facts and receive tangible information before a crisis situation (like the drought) occurs.

Response: Mr van Wyk supported Mr Ashe's suggestion.

DWS KZN

(c) Mrs Jones thanked the study team for providing the action list arising from SSC Meeting No. 6. She encourage that this practice is maintained for future meetings as it allows members to keep track of discussions.

Response: Mrs Jones' remarks were noted, with thanks.

(d) Mrs Jones stated that the status of the Item 8.2 (e) on page 3 of the Agenda (action list) should not be indicated as 'done' because the action is incomplete. She understood that the iLembe DM did not attend the Technical Support Group (TSG) meeting despite being invited. She requested the action list to be updated accordingly as iLembe's participation is crucial.

Response: The action list will be updated and iLembe will again be invited to upcoming meetings.

Bongi Shinga

(e) Mr Ashe indicated that the Environmental Assessment Practitioner (EAP) for the uMkhomazi Water Project (uMWP) EIA did not provide the requested information relating to public consultation, including schedules of meetings. He requested to be involved and provide inputs to the EIA process.

Response: Mr Bester indicated that he will follow up with the EAP, Mr Donavan Henning. He added that the Scoping Phase consultation is complete and public meetings will be held as part of the EAI Phase. This information will be made available once dates have been finalised.

Kobus Bester

5. STATUS AND REVIEW OF STRATEGY

5.1 Water requirement projections

Mr Jonathan Schroder presented the water requirement projections and water balances. His presentation covered the following:

- Supply areas covered in the Strategy.
- Water requirement projections.
- Revised water balances for three water supply systems (WSSs), namely the South Coast, Mdloti-Mvoti and Mgeni.
- A risk assessment undertaken on the Mgeni WSS.
- A summary of the potential medium-term impacts of climate change on the Mgeni WSS.

The following comments were raised:

(a) Mr Paul Herbst enquired about the factoring of Water Conservation and Water Demand Management (WCWDM) volumes in water requirement projections. He requested that the graphs show two lines, one for the projection **with** and one **without** WCWDM.

Response: Mr van Wyk agreed and said the graphs will be updated accordingly.

Jonathan Schroder

- (b) Mrs Jones asked whether the Mdloti-Mvoti balance included the Thukela supply area.
 - **Response**: Mr Schroder confirmed that the balance includes water supplied from the Thukela into the Mdloti-Mvoti. He added, however, that the Thukela supply area falls within the focus area of the uMhlathuze Reconciliation Strategy and, as such, it is important to avoid double counting by excluding areas that fall outside the focus area of the KZN Strategy.
- (c) In reference to the Mdloti-Mvoti water requirement projection (Slide 10) Ms Bhavna Soni enquired about the sudden decrease in 2023.
 - **Response**: Mr Schroder explained that this is due to the potential reduction in water supply from Hazelmere Dam when the proposed Smithfield Dam (uMWP-1) is commissioned.
- (d) Ms Masefield asked if it was realistic to bring in Isithundu Dam in 2024. She requested that this date be re-considered in light of current water restrictions in the Mdloti system and water requirements.

Response: The study team will consider this in the subsequent revisions of the water balance.

Jonathan Schroder

5.2 Water balances

(a) Prof Forbes mentioned that 15 or 20 years ago, there was an article on 'Living Waters' which predicted that 2015 will be one of the worst case scenarios in terms of water scarcity.

Response: Mr Schroder indicated that it is difficult to comment whether these predictions are true or not. It should be noted that our country is in a situation where the resources required to satisfy our water requirements have been extensively developed. Other factors include climate change impacts, anthropogenic impacts on the hydrological cycle and increases in water use due to an increase in population.

(b) Mr Ward stated that if one considers the current situation and looking at the actual magnitude for a large system, one can implement interventions to relieve stress from the Mgeni WSS.

Response: Mr Meier explained that, in contrast to the North Coast, the South Coast is mainly constrained by water infrastructure (i.e. the water requirement exceeds the pipeline capacity). As such, with or without a drought, there will always be a shortage of water. It is for this reason that the South Coast should be prioritised in the Strategy and potential sources of water investigated in detail.

5.3 Review and updating of Strategy interventions list

5.3.1 Mooi-Mgeni Transfer Scheme (MMTS)

Mr Kobus Bester presented the MMTS on behalf of Mr Kroon from the Infrastructure Unit.

5.3.2 Raising of the Hazelmere Dam

Mr Kobus Bester presented an update on the raising of the Hazelmere Dam. Comments raised are presented below:

(a) Mr Ashe stated that one of the important issues regarding the raising of Hazelmere Dam is that communities living in the vicinity were not adequately consulted. He added that this might create problems and delay the process. It may be necessary to check if the EIA was completed and understand what were the conditions attached to environmental authorisation.

Response: Mr Bester thanked Mr Ashe for his comment and confirmed that the matter will be looked into.

Kobus Bester

5.3.3 <u>uMkhomazi Water Project (uMWP)</u>

Mr Kobus Bester presented an update on the uMWP.

(a) Ms Lungile Cele, General Manager: Water Services of Ugu District Municipality (DM) pointed out that the continuation of projects without approval from the relevant Councils can create problems later on. She requested clarity on how the Department is continuing with the project as it may be important to apply a different approach so that they do not experience similar institutional challenges as with Spring Grove Dam. She added that Ugu DM has not received approval of the uMWP from the Executive Council. There is also a need to clarify and address issues associated with Capital Unit Charge (CUC) related to Spring Grove Dam.

Response: Mr Kobus Bester explained that the process of consulting with all relevant municipalities is in progress. Some meetings have already happened and some are in the process. This consultation process is however not without challenges (e.g. meetings are confirmed and then later cancelled). He emphasised the importance for the Water Service Authorities to prioritise meetings so that there is progress in getting Council Resolutions.

Mr Mabuda agreed and added that DWS takes note of the importance of this issue. Furthermore, council resolutions will be required for the submission to Parliament.

Kobus Bester / Lungile Cele

Shinga

(b) Ms Khuthalile Mahlaba, Deputy Manager: Municipal Infrastructure, COGTA suggested that DWS attends the upcoming Technical MuniMEC (a forum for Municipalities and Members of the Executive Councils) to share uMWP with all Municipalities and promote cooperation.

Response: Mr Mabuda, thanked Ms Mahlaba and requested Mr Bester to action accordingly.

(c) Ms Khuthalile Mahlaba requested a copy of the uMWP presentation.

Response: This request was noted. Subsequent to the meeting the presentations were

5.3.4 Lower Thukela Bulk Water Supply Scheme (LTBWS)

Mr Kevin Meier, Planning Services Manager, Umgeni Water, provided an update on the LTBWSS. He explained that the contract consists of six components and summarised progress as follows:

- Water Treatment Works: 34% complete.
- Access roads, weir and abstraction works: 82% complete.

provided to Ms Mahlaba and receipt confirmed via email.

- Mechanical and electrical: 44 % complete.
- Gravity main: 79% complete.
- Rising main and reservoir: 9% complete.
- Bulk water supply: 0% complete.

Practical completion is set for June 2016 and overall completion set for December 2016.

5.3.5 North Coast Pipeline and Hazelmere Supply Infrastructure

Mr Meier provided a progress update, as follows:

- Water treatment works and Hazelmere pump station upgrade at practical completion.
- Pump station has been tested and is ready for use.
- After a recent shutdown, the works (both old and new) were operated at 70 Ml/d for a few hours to help recover reservoir levels in the distribution system.

5.3.6 Lower uMkhomazi Feasibility Study (South Coast)

Mr Meier summarised progress as follows:

- Detailed feasibility study is underway, with expected completion date of October 2015.
- EIA is underway, to be completed by July 2016.
- Estimated construction completion date is March 2022.
- Estimated cost of project is R 2.2 billion.
- (a) Mr Bryan Ashe requested clarity on the operation of the dam, specifically in reference to the statement that the dam will be "utilised during drought conditions". He also enquired whether the scheme will be used by SAPPI-SAICCOR?

Response: Mr Meier explained that Ngwadini Dam is an off-channel storage dam, filled from the uMkhomazi River and used for supply during low flow periods. He also said that Umgeni Water is planning the development of the scheme for supply to the South Coast and will be negotiating with SAPPI whether they will be using water from the dam. Alternatively SAPPI will be abstracting directly from the river as they are currently doing.

(b) The question was also raised about the possibility of using Ngwadini Dam generating hydropower?

Response: Mr Meier explained that this would not really be feasible since the hydropower potential is small.

5.3.7 Desalination Plants

Mr Meier indicated that a feasibility study was undertaken for the desalination option. In total, three sites have been identified, one in the South Coast and two on the North Coast. A due diligence study was also undertaken as part of site selection. Umgeni Water has also done some water quality sampling and monitoring on site for a year, to identify problematic parameters, such as high algae content. Umgeni Water started the process of constructing a pilot plant.

He summarised key steps for the desalination plant as follows:

- The EIA is currently underway, with expected completion date of September 2015.
- The pilot plant tender has recently been awarded. Construction period estimated to be six months, with a total 18-month project period.
- Detailed feasibility study completed. Final report to be submitted in March 2015.
- The total cost of one of these projects is approximately R 3.4 billion for a 150 Mt/d plant. The
 capital cost is similar to that of the Lower uMkhomazi BWSS although the operating costs for
 desalination plant will be higher.
- Total cost of water is estimated at R10/kl to R15/kl. However, this does not necessary imply an equivalent increase in the tariff for Ugu and eThekwini, which may increase by between R1.00/kl and R1.50/kl.
- Quickest implementation date for the project is estimated as 2019. This may result in desalination being favoured above the Lower uMkhomazi BWSS, since augmentation is required by 2016. However, a decision in this regard has not been made.
- (a) Mrs Jones suggested that, if we know that there will likely be a shortage in two years' time, Umgeni Water should warn the public of this possibility. She added that education will be extremely important in achieving the required savings.
 - **Response**: Mr Meier agreed and added that the current drought situation has, to some extent, already increased public awareness. He also said that Umgeni Water will approach Ugu DM to promote cooperation on educating and awareness programmes.
- (b) Mr Holland pointed out the potential risk in the high energy requirements of the desalination option, within the context of unreliable power supply in the country.
 - **Response**: Mr Meier said that they anticipate sufficient power being available from Eskom at the planned implementation date of this option.
- (c) Mr Ashe enquired if Umgeni Water has considered renewable energy to provide power for the scheme.

Response: Mr Meier said renewable energy, e.g. wave energy, solar energy, etc. have been considered, however, Eskom remains the most affordable source of electricity. He added that Umgeni Water will issue the tender as a "design, build and operate" scheme and include requirements related to the efficient use of electricity.

(d) Ms Mahlaba suggested that it may be beneficial invite Eskom to the next SSC meeting to provide information on their strategy and coordinate activities at a planning level.

Response: Mr Mabuda indicated that DWS does meet with Eskom on an annual basis as part of a liaison process. Mr van Wyk added that the SSC is restricted by the terms of reference for the study and it is not the responsibility of the SSC to directly discuss planning requirements at a broader level with Eskom. However, DWS can investigate this suggestion, perhaps as a once-off engagement.

Niel van Wyk

5.3.8 Re-use of Water: Hazelmere Dam

Mr Bill Pfaff discussed the option of using indirect re-use by pumping treated sewage effluent back to Hazelmere Dam and thus providing relief for the drought situation. He presented a slide that shows the location of Hazelmere Dam in relation to the Tongaat and Verulam wastewater treatment works. The summary of his feedback is as follows:

- Currently the treatment works run at 9 and 10 Mt/d, respectively.
- The capital cost outlay associated with commissioning pumping stations to transfer water back to Hazelmere Dam for the benefit of 15 Ml/d is not a feasible option.
- The possibility of implementing this option may, however, be considered in future when effluent volumes (and the associated ecological impact on downstream riverine systems) have increased.

5.3.9 Water Conservation and Water Demand Management (WCWDM)

(a) eThekwini Metropolitan Municipality

Mr Simon Scruton, Manager: Non-Revenue Water, presented an update on behalf of eThekwini Metropolitan Municipality.

Responses were as follows:

Mr Norman Ward noted that maintenance activities need to be undertaken to ensure that eThekwini WCWDM initiatives are effective.

Prof Buckley added that technical solutions will only be effective if there is public support.

Mr Mabuda agreed and noted that communication is key to achieving the desired results. He added that additional budget for infrastructure maintenance will be required, with the necessary buy-in and approvals by Council.

(b) uMgungundlovu District Municipality

Mr Sibusiso Mjwara, Head: Infrastructure & Planning Development presented feedback on behalf of uMgungundlovu District Municipality

Prof Forbes notes that data used in the presentation is from 2011. He asked if have there been any changes since then.

Response: Mr Mjwara explained that the projects have not yet been completed.

Mr Bryan Ashe stated that eThekwini have successfully used awareness campaigns to educate the public. He added that, without these initiatives, metering and billing for water use in low income households is futile.

Response: There is a unit within uMgungundlovu DM that is responsible for creating awareness and communicating with water users. Workshops have already commenced and some improvement in public behaviour has been observed.

(c) Msunduzi Local Municipality

Mr Mike Greatwood submitted his apology for the meeting; as such there were no representatives to provide feedback on behalf of Msunduzi Local Municipality.

Mike Greatwood

(d) iLembe District Municipality

In preparation for the meeting, Mr Notha Maphumulo had confirmed attendance; but did not attend on the day of meeting. As such, there were no representatives to provide feedback on behalf of iLembe District Municipality.

Notha Maphumulo

(e) Ugu District Municipality

Ms Lungile Cele, General Manager, Water Services presented on behalf of Ugu District Municipality.

Mr Paul Herbst stated that the Blue Drop programme was implemented two years ago. All municipalities have been assessed and reports will be released in due course. This will assist municipalities on planning and prioritising spending on WCWDM.

6. OPERATIONAL AND DROUGHT MATTERS

6.1 System Operation Management Forum and Drought Situation

Ms Angela Masefield gave a brief presentation on the drought situation in KwaZulu-Natal, with the focus on the water supply systems where the impacts are most severe. Her presentation highlighted the following key points:

- Forecasts are showing the drought is likely to intensify.
- Goedetrouw Dam is nearing 50% Richards Bay is moving into Level 3 restrictions.
- The rainfall is below average in the uMzinto area and EJ Smith Dam failed in October.
- Level 3 restrictions have been in place in the Hazelmere Dam supply areas December.
- An emergency pumping scheme from Tongati River will be commissioned by mid-April.
- The Premier declared a Provincial Disaster in November. The Department pledged approximately R350 million to assist with drought alleviation. This is based on request from municipalities to provide tankers to supply households and communities.
- There is a provincial joint operations committee that will monitor the drought.
- Provincial CoGTA has received drought implementation plans

(a) Prof Forbes asked what actually constitutes a drought.

Response: Ms Masefield explained that the KZN Province declared the drought in October/November 2014. She added that the Department generally avoids declaring a drought prematurely to avoid possible negative social-economic impacts. It is therefore crucial for the Department to make the right decision and at the right time.

(b) Mrs Jones suggested that infrastructure is also not being adequately maintained.

Response: Ms Masefield agreed and said the Department needs to encourage Municipalities to prioritise maintenance and allocate adequate budget.

7. COORDINATION WITH OTHER STUDIES

7.1 Previous and Current Studies

7.1.1 Classification of Water Resources in the Mvoti to Umzimkulu WMA

Ms Shane Naidoo, Director: RDM-WRC (Water Resource Classification) presented the progress on the Classification of Water Resources in the Mvoti to Umzimkulu WMA.

7.1.2 <u>uMngeni Ecological Infrastructure Partnership (UEIP)</u>

Mr Mahlodi Tau, SANBI provided an update on the activities of the uMngeni Ecological Infrastructure Partnership.

7.2 Other relevant items

7.2.1 Rainwater Harvesting: Dube TradePort

Ms Erna du Plessis, Senior Manager, AgriZone Operations provided an overview of the Rainwater Harvesting practices which they are implementing at the Dube TradePort Corporation (DTPC).

- (a) Mr Bryan Ashe encouraged SSC members to learn from the DTPC initiative and described rainwater harvesting as an important intervention option.
- (b) Prof Buckley stated that at the request of Mr Neil McCleod from eThekwini Municipality, civil engineering students have started investigating rainwater harvesting as a sustainable option. He said that it was encouraging to see Municipalities taking an active role in this regard.
- (c) It was also mentioned that renewable energy has been adopted by CoGTA as part of their strategy in dealing with climate change. He suggested that rainwater harvesting could piggyback on this initiative.

Response: Mr Mabuda agreed and requested that these initiatives are included in the media release. In addition, rainwater harvesting should be one of the initiatives that are encouraged as part of WC/WDM.

Jonathan Schroder

8. COMMUNICATION

8.1 Confirmation of SSC Members

This is a standard item on the Agenda. Members were encouraged to continually review the list and provide feedback in this regard to the study team.

8.2 Key messages and focus of Status Report and Media Release

Mr Niel van Wyk requested SSC members to indicate if there are particular key messages they would like to be included in the status report, which will be prepared after the SSC meeting.

ΑII

9. KEY ACTIONS FOR TSG (TECHNICAL TEAM)

The way forward was summarised and the following key points highlighted:

• The potential impact of WCWDM should be accounted for explicitly in the water requirement projection (i.e. "With"- and "Without"-scenarios).

Jonathan Schroder

 Feedback must be provided on climate change impact assessment undertaken for the Strategy.

Gerald de Jager

 Water demand projections for the North Coast need to be updated. An updated WCWDM plan is now available and the study team must engage with Umgeni Water on this aspect.

Jonathan Schroder

The key dates on the interventions list need to be updated. The interventions list should be
used as a monitoring tool for both the technical team and SSC members. SSC members were
encouraged to use it to update information (new and old), provide feedback and add new
interventions as and when applicable.

ΑII

Mr van Wyk suggested that perhaps there is a need to re-evaluate the structure followed for
future SSC meetings. He suggested the possibility of starting the meeting earlier in the
morning, with a session after lunch that focusses on a particular discussion item. He
acknowledged that the intention is to cover a large number of items, but added that it is
equally important to ensure the agenda is practical and allows for sufficient time to discuss
key issues.

Response: This suggestion was noted for consideration in the planning SSC Meeting 8.

Gerald de Jager

10. CLOSING COMMENTS FROM SSC MEMBERS

The Chairperson gave an opportunity to SSC members to share any further comments. The following remarks were received:

(a) Ms Lungile Cele again mentioned that the presentation of uMWP to Council for approval needs to be prioritised.

Kobus Bester

- (b) Mr Wade Holland indicated that it will be important to promote sustainable initiatives, where possible. He referred, specifically, to large infrastructural developments where this can be considered at planning stage.
- (c) Mr Bryan Ashe supported this suggestion. He also said a campaign will be launched to advise the premier on climate change impacts.

(d) Mr Bill Pfaff mentioned that a study is being undertaken by the WRC to investigate "dual grey and drinking water reticulation system" for urban design. He suggested reporting back to the SSC on this study for possible consideration in the Strategy.

Bill Pfaff

11. DATE FOR NEXT SSC MEETING

The next meeting will be held on **Wednesday**, **9 September 2015** at the Durban Jewish Centre. Notifications will be circulated to all SSC members.

Bongi Shinga

12. CLOSURE

The Chairperson thanked the SSC members and study team for their attendance and participation in the discussions. He also expressed his happiness with the progress made to date and added that the information shared at the meeting has been of great value. He stated that there is a well-coordinated programme for the study and the Department will be willing to assist where possible.

Mr Mabuda then closed the meeting.

Annexure A: Attendance Register

Section 2.1 of the minutes provides a list of attendees. A copy of the signed attendance register can be provided upon request.

Annexure B: Presentations

Due to the file size of presentations, they will be provided upon request.