


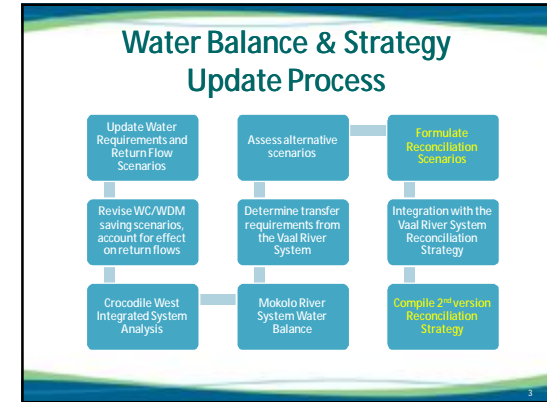
## Proposed Revision of Reconciliation Strategy

*Maintenance of the Crocodile West River System Reconciliation Strategy Study*



## Current Strategy

- Rand Water service area
  - Continued supply from the Vaal River
- Areas north of the Magaliesberg
  - Increasing treated effluent from metropolitan area will be future source of water for mining and urban requirements north of the Magaliesberg
- Waterberg area (north of Crocodile West catchment)
  - Optimal utilisation of local resources to be continued
  - Surplus effluent to be transferred to Lephalale area, if required



## Reconciliation Perspective

- Surplus water available for re-use or transfer (base scenario)
- Surplus utilisation scenarios:
  - Tshwane Potable Water Augmentation Program
  - Transfer to Lephalale by 2016 to be determined
  - Alternative water requirement scenario of Magalies Water (Pienaars System)

## Tshwane Potable Water Augmentation Scenario

- Unsustainable utilisation of Rietvlei Dam.
- Reduces supply from Vaal by 76 million m<sup>3</sup>/a.

## Magalies Water's water requirement scenario

- Insufficient water available in the Pienaars River System from 2020 onwards.
- Surplus in Hartbeespoort and Rietvlei dams sufficient for transfer needs to the Lephalale area.

## Crocodile West River System SSC – 29 July 2010

### Conclusion

- Available surplus cannot support both the Tshwane Potable Water Augmentation Program and Magalies Water scenario.
- Key factor influencing future water balance is the water demands and projected return flows from waste water treatment works.

### Recommendations (1)

- Must prioritise future water abstraction licenses.
- Coordinate planning between bulk water service providers – propose a technical workshop.
- Implement Water Conservation and Water Demand Management measures according to implementation plans.
- Annual monitoring of return flow volumes and review of system water balance.

### Recommendations (2)

- Develop integrated system operating rules to accommodate reconciliation strategy - part of AOA study.
- Engage water users through System Operation Forum.
- Complete validation and verification of existing lawful use and review water balance.
- Commission study to develop long term water requirement scenarios up to the year 2050.
- Implement ecological monitoring programme.

### Proposed Revised Reconciliation Strategy

- Rand Water service area
  - Continued supply from the Vaal River
  - Prioritise bulk abstraction options (surplus dependant),
- Areas north of the Magaliesberg
  - Increasing treated effluent from metropolitan area will be future source of water for mining and urban requirements north of the Magaliesberg
- Waterberg area (north of Crocodile West catchment)
  - Optimal utilisation of local resources to be continued
  - Transfer water to Lephale area
- Augment Crocodile System from Vaal, if needed

### Next Steps

- Technical coordination workshop between bulk service providers.
- Compile Reconciliation Strategy Report.
- Study closure.

Thank you



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