

## **Sustainable Water Resources seminar**

The seminar presented a fantastic opportunity to understand what paradigms need to shift from long-term water resilience while also trying to understand the role of stewardship from a citizenry point of view – be it private companies as corporate citizens or private citizens themselves. Against this backdrop the following was discussed.

Cllr Selowa (City of Tshwane) opened the seminar with thoughts about the Metro's water stress and what interventions are being exercised to mitigate this stress: interventions such as investigating overhauling the water distribution system, diversifying the water mix, outreaches to promote water demand management and conservation and the incorporation of water resilience into their Green Building By-laws.

The opening presentation was given by Dr Anthony Turton, who spoke about paradigms in the water sector that need to change. For example, Integrated Water Resource Management has, through the years, posited a paradigm of scarcity. According to Dr Turton, it's not; it is actually an infinitely renewable resource. Using history, he showed that if we see water not as a stock but as a flux, water can become the foundation of a rejuvenated national economy.

Dr Jennifer Molwantwa of the Inkomati- Usuthu Catchment Agency presented on IUCMA Sustainable Resource Management Tools. The foundation of her presentation was built on the following concepts:

- Decision making is an inherent management function
- However, to make quality decisions, management depend on the availability of quality information.
- Quality information is derived from quality data.

She concluded with the understanding that good quality data can be used to rigorously inform stakeholders within the catchment.

Mr Anton Earle of the Stockholm International Water Institute (SIWI) delivered a European view of the state of water as it pertains to the SIWI focal areas of capacity building and water governance reforms. He gave fantastic context to the water status quo within Africa by providing stats on economic growth, diversification, demographic shifts, urbanisation and opportunities. He illustrated all of these points using a case study of Lake Awassa, Southern Ethiopia, and concluded with the following thoughts:

- Good governance a necessary, but not sufficient condition for attracting investments
- Social and environmental issues need to be addressed
- Capacity of the poor to pay for water is well established
- Earlier thought to financial models needed
- Enhance development impact.

Standing in for Mr Dhesigen Naidoo, Chief Executive of the Water Research Commission, Ms Valerie Naidoo (no relation), presented on a topic entitled, "*The Impact of Smart Technology on the Water Sector: New Sanitation – Nucleus of the Circular Economy*". The thrust of her message was that we have to move away from a resource-constrained, business-as-usual approach, but rather begin to consider a circular economy-based approach to water resource management. This concept was aptly illustrated by way of a sanitation example. If one looks at sanitation from a circular economy perspective it quickly becomes apparent that a great deal of products and processes are available to

engage with outside of the usual linear process; like energy production, chemicals extraction, water use and energy use.

Gordon Allen, who presented on behalf of Mr Benoit Le Roy (CEO of Water Shortage South Africa), provided great context for the reiteration of Dr Turton's message of holding a paradigm of water abundance, not scarcity. He then shared Water Shortage's vision, which is to *be the leading water shortage mitigation enabler acting as a catalyst to water abundance in SA and eventually abroad*. The macro opportunities and "specific" opportunities within the water sector were detailed.

Intrinsic to their business, AB InBev began to look at the following key reasons for water conservation:

- *Availability (physical & infrastructure)*
- *Declining water quality*
- *Reputation*
- *Data availability.*

Mr David Grant, of AB InBev, continued to unpack each of those issues in terms of value of water, risk, stewardship, brand value and innovation. In conclusion, Mr Grant, summed up with the following sentiments: we need to get better at both collaborating and sharing data.

As one of Sustainability Week's sponsors, Inyatsi, represented by Mr George de Sousa, weighed in with an informative presentation on water conservation within the construction sector. George presented their 3 Rs water-efficient strategy of reduce, replace and reuse. He went on to say that the most cost-effective way to deliver water efficiency is by incorporating water saving principles into all aspects of the project from inception. Inyatsi's action plan for reducing water use on site was also presented. In conclusion, Mr de Sousa said that engineering solutions alone cannot deliver the solutions to the many challenges we face, which is why we must focus on innovation and behavioural change.

In his opening slides, Mr Raldo Kruger of GreenCape introduced the current, painful issue of the drought in the Cape so as to paint a stark contrast for the opportunities that were to come: the key opportunities within the urban water sector, as highlighted by Kruger, were: water metering and monitoring, reuse and efficiency and alternative water supply. He then illustrated those points by way of two case studies – one for a medium-sized manufacturing company and one for a large manufacturing company – which proved the case both financially and from a supply-side perspective. His concluding remarks were, "There are good prospects for investment in the Western Cape and, current tariffs make projects financially feasible with decent payback periods. Technical, financial, regulatory barriers can be overcome, but some will take time."