SEMINAR - Day zero: What can a drought prone city do to prevent dry taps? The case of Cape Town

Venue: Faculty of Science, University of Copenhagen, Bülowsvej 17, DK-1870 Frederiksberg C. “Festauditoriet” (main auditorium)

South Africa is one of the world’s emerging economies, but rapid urbanization and water shortage pose severe challenges. Cape Town – a rapidly growing city of four million – is currently suffering from the worst drought on record. After three consecutive dry years, including the two driest years on record, the reservoirs supplying the region are nearly empty. Extreme water restrictions – limiting per capita daily use to a mere 50 liters – have been implemented and contingency plans made for a complete shut-down of 75% of the system with water only available at 200 water points guarded by the army. What to do about this situation? Storm water harvesting and managed aquifer recharge may in combination with improved water use efficiency increase the resilience of the city. Can it be done? Together with Vand i Byer-netværket, the Faculty of Science at the University of Copenhagen is inviting interested to join us for an afternoon where researchers from University of Cape Town give details on the challenges and present their ideas on how to improve Cape Town’s resilience towards climate change through water sensitive urban design. To enhance collaboration we have invited Danish specialists to contribute too. Participation is free, but registration is necessary. Please register here.

Program

13.00 Welcome /Peter Holm and Marina Bergen Jensen, KU-Science

13.15 Overview of the drought situation in Cape Town, and considerations on the option of managed aquifer recharging /Neil Armitage, University of Cape Town

13.40 Forward Osmosis as a Potential Technology for Industrial Waste Water Reclamation in South Africa /Claus Hélix Nielsen, DTU

14.00 Overview of water treatment options when harvesting, recharging and reclaiming. Solutions for different scales and costs /Mathias Lassen Nørlem, Krüger

14.20 Refreshments

14.40 What are the major water quality challenges and which control options do we have when harvesting stormwater, recharging groundwater with urban water, and reclaiming wastewater /Kirsty Carden, University of Cape Town

15.05 Has Cape Town got what it takes to manage a transition towards a water sensitive urban design? /Patience Mguni, University of Cape Town & Wageningen University

15.30 Discussion /Lise Herslund, University of Copenhagen

16.00 Mingling in the ‘bar’