

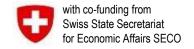


South African - German Energy Programme (SAGEN) Support to South African Municipalities





















Background information on GIZ

- As a governmental organisation, GIZ implements sustainable development projects worldwide on behalf of the German government
- GIZ operates in more than 130 countries and employs some 20,000 staff members (with a 70 - 30% split between national and international personnel)
- In South Africa, GIZ first started in 1994 and has since implemented projects with a total volume of more than EUR 550 million as part of the bilateral cooperation between Germany and South Africa
- The main focus of our work in South Africa is Governance and Public Administration, HIV/AIDS, Energy and Climate



















Structure of SAGEN-3 (2018-2020)

Objective:

National and local stakeholders use improved framework conditions for RE and EE

Renewable Energy (RE)

Component A:

Large-scale grid-connected RE

Component B:

Small-scale embedded generation (SSEG)

Energy Efficiency (EE)

Component C:

Energy management systems in municipalities

Component D:

Implementation of energy efficiency technologies

Support to Municipalities







Partners in the implementation of SAGEN











































OVERARCHING

Collaboration with SALGA:

- Seconded advisor (Ryan) on Sustainable Energy
- Assistance in SALGA activities and facilitate capacity building programmes

Collaboration with Eastern Cape DEDEAT:

- Seconded advisor based in East London (Sander)
- Direct support to municipalities in Eastern Cape

Collaboration with Nelson Mandela Bay:

- Seconded advisors in Electricity Department (David and Sibulele)
- Ad-hoc support (e.g. solar panel demo for training centre)
- SWH pilot (200 systems)











Component B: Small Scale Embedded Generation





Components A and B: Renewable energy activities under SAGEN-3

Grid and system integration
of variable RE

- Grid access (generator grid code)
- Transmission system planning and operations (system stability, ancillary services, network pricing, ...)
- Distribution system
 planning and operations
 (DNOP standard,
 Quality of Supply
 practices, grid
 protection standard,
 battery storage, longterm planning, ...)
- Helpdesk

Implementation of SSEG at distribution level

- AMEU SSEG guidelines
- Introduction of application and registration processes in 25 municipalities
- National SSEG registration process (in cooperation with the GIZ-CSP programme)
- Promotion of PV Green Card Programme
- Municipal procurement of SSEG assets

Electricity sector regulatory framework development & reform

- Cost of Supply regulation
- Wheeling and grid access regulation
- Municipal energy planning

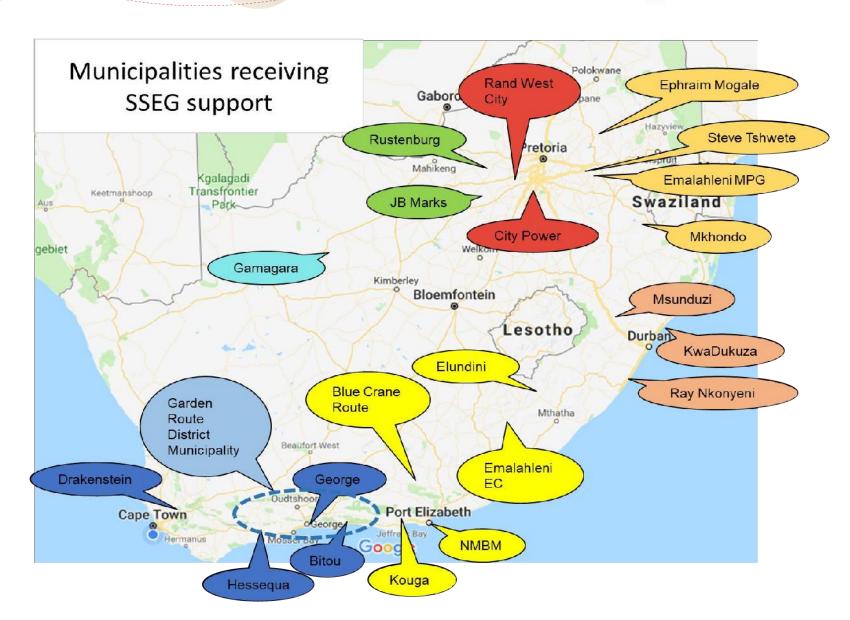
Structual change in the energy sector

- Just coal transition
- Socio-economic transformation

Main partners: DoE, Eskom, SALGA, AMEU, municipalities, NERSA, Industry associations

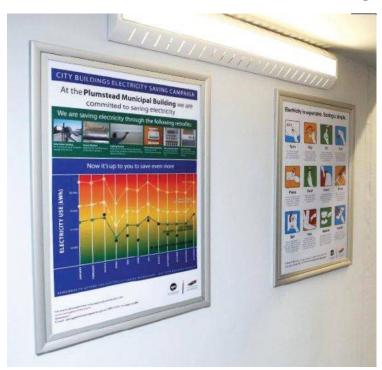


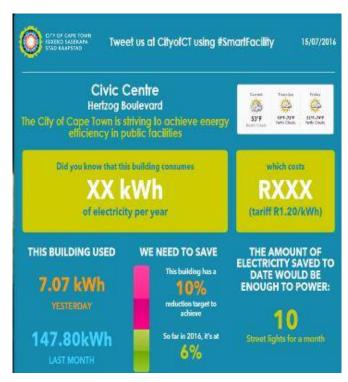






Component C: Municipal Energy Management Systems





Component C: Municipal Energy Management Systems (MEMS)

Learning by exchange for "innovator municipalities"

- Support to learning and exchange platforms for networking and sharing best-practice between municipalities on MEMS
- Assist selected municipalities in updating their energy action plans
- Provide expertise for specific topics (on a needs basis)

Piloting MEMS in "aspirant municipalities"

- Assist in the implementation of an adapted MEMS in 4 - 6 selected municipalities (based on the specific capacities)
- Share experience through learning networks
- Support the selected municipalities in compiling municipal energy efficiency action plans (MEEAP)

Creating awareness in "beginner municipalities"

- Development of material for training and awareness raising for MEMS
- Training courses on MEMS
- Organisation of learning excursions

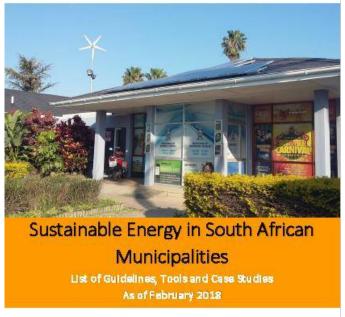
Partners: SALGA, AMEU, municipalities, NCPC, DoE, NT, COGTA





Support Tools and Knowledge Sharing Products





In Partnership With







Urban Energy Support Platform

cityenergy.org.za

Small-Scale Embedded Generation Municipal Resource Portal

sseg.org.za





Relevant Support Documents

The electricity distribution in Germany and South Africa- A review of policy and regulations::

https://sagen.org.za/publications/79-the-electricity-distribution-in-germany-and-south-africa-a-review-of-policy-and-regulations/file

Sustainable Energy & Climate Change in Municipal IDPS 2017-2018:

https://sagen.org.za/publications/80-sustainable-energy-climate-change-in-municipal-idps-2017-2018/file

Renewable Energy Scenarios for Municipalities:

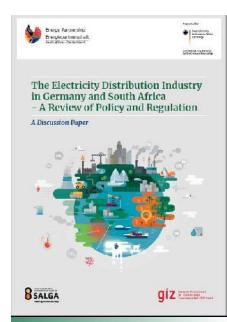
http://www.cityenergy.org.za/getfile.php?id=452&category=5

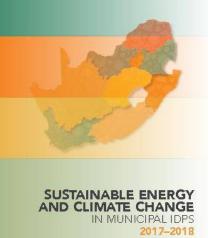
Opportunities in Energy Efficiency for Municipalities:

http://www.cityenergy.org.za/uploads/resource 454.pdf

• Status of Small Scale Embedded Generation in South African Municipalities:

 $\underline{https://www.sseg.org.za/wp-content/uploads/2019/03/Status-of-Small-Scale-Embedded-Generation-in-Municipalities-October-2018.pdf}$





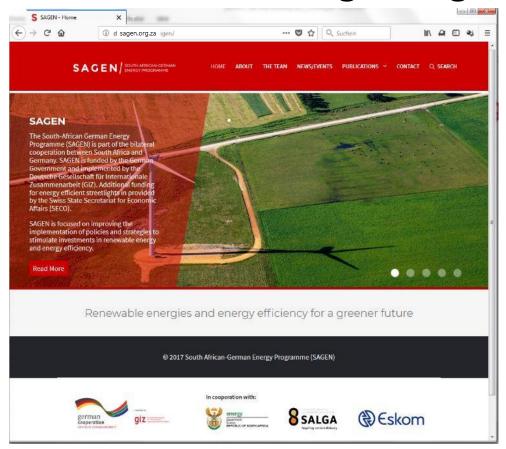








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