

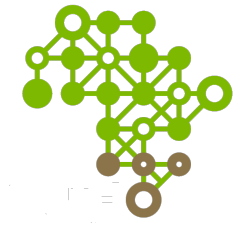
South African National Grid

Infrastructure and User communities

Bruce Becker – CSIR Meraka Institute
South African National Grid

19.9.2011

Bruce Becker | bbecker@csir.co.za
Coordinator – SAGrid | <http://www.sagrid.ac.za>



Outline

- SAGrid infrastructure
- Support and collaboration with other projects
- User Community support and development







NORTH-WEST UNIVERSITY
YUNIBESITHI YA BOKONE-BOPHIRIMA
NOORDWES-UNIVERSITEIT

UCT CERN



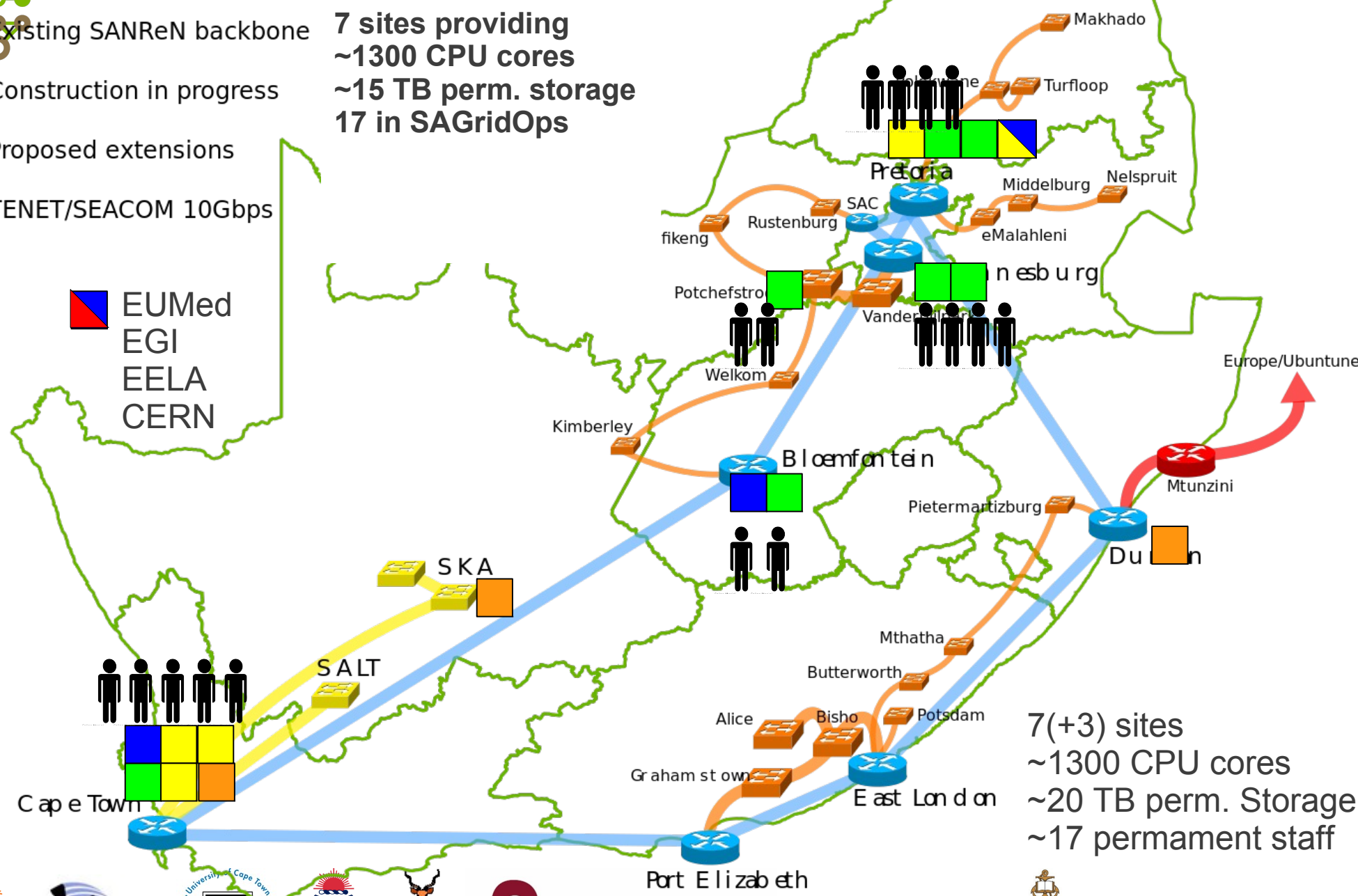
UNIVERSITEIT VAN PRETORIA
UNIVERSITY OF PRETORIA
YUNIBESITHI YA PRETORIA

 Functional Sites
  Core Services
  Deployment In progress
  Proposed extensions
  External Infrastructure

 Existing SANReN backbone
 Construction in progress
 Proposed extensions
 TENET/SEACOM 10Gbps

7 sites providing
~1300 CPU cores
~15 TB perm. storage
17 in SAGridOps

 EUMed
 EGI
 EELA
 CERN



7(+3) sites
~1300 CPU cores
~20 TB perm. Storage
~17 permanent staff

Projects to respond to e-Science challenges

- EPIKH – <http://www.epikh.eu>



- Exchange Programme to Advance e-Infrastructure Know-How

- CHAIN – <http://www.chain-project.eu>



- Coordination and Harmonisation of Advanced e-Infrastructures

- SPECIAL – <http://www.special-project.it>

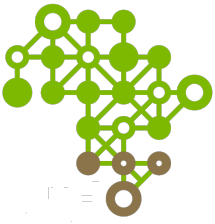
- "Supporting virtual research communities across Italy and South Africa"



NORTH-WEST UNIVERSITY
YUNIBESITHI YA BOKONE-BOPHIRIMA
NOORDWES-UNIVERSITEIT



UNIVERSITEIT VAN PRETORIA
UNIVERSITY OF PRETORIA
YUNIBESITHI YA PRETORIA



User Communities

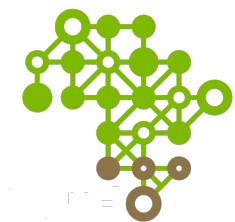
- Major focus since end 2009, lots of work during 2010
- Mission : support all users, in VO's, in our region, and the world, through infrastructure sharing
- Support issues – a problem of scale.
- Self-supported communities :
 - ATLAS VO (2 sites)
 - ALICE VO (2 sites)
 - E-NMR (2 sites)
 - BIOMED



NORTH-WEST UNIVERSITY
YUNIBESITHI YA BOKONE-BOPHIRIMA
NOORDWES-UNIVERSITEIT



UNIVERSITEIT VAN PRETORIA
UNIVERSITY OF PRETORIA
YUNIBESITHI YA PRETORIA



User Communities

- SAGrid is catch-all VO
- Has to develop and support **”the long tail”** : single applications used by many groups of few people.
- Permanent call for new applications via questionnaire – porting where necessary
- Try very hard to coordinate with EGI AppDB, CHAIN/EPIKH AppDB's



NORTH-WEST UNIVERSITY
YUNIBESITHI YA BOKONE-BOPHIRIMA
NOORDWES-UNIVERSITEIT



UNIVERSITEIT VAN PRETORIA
UNIVERSITY OF PRETORIA
YUNIBESITHI YA PRETORIA