

SADC MET

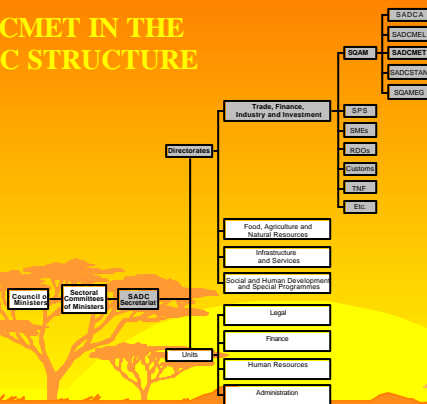
NATIONAL METROLOGY INSTITUTES IN THE
SOUTHERN AFRICAN DEVELOPMENT COMMUNITY
COOPERATION IN MEASUREMENT TRACEABILITY

Dr F Hengstberger, Regional Coordinator: SADC MET

SADC MET AND AFRICA



SADC MET IN THE SADC STRUCTURE



ACRONYMS USED

NMI – NATIONAL METROLOGY INSTITUTE

LMO – LEGAL METROLOGY ORGANIZATION

NSB – NATIONAL STANDARDS BODY

NAB – NATIONAL ACCREDITATION BODY

SQAM – STANDARDIZATION, QUALITY ASSURANCE, ACCREDITATION AND METROLOGY

SADC – SOUTHERN AFRICAN DEVELOPMENT COMMUNITY



ANGOLA

Surface area 1 247 000 km²
Population 12 900 000



NATIONAL METROLOGY INSTITUTE

INSTITUTO ANGOLANO DI NORMALIZACAO E QUALIDADE (IANORQ)
C.P. 594, Luanda, Angola
Tel +244 2 337 294 Fax +244 2 392 400 E-mail ianorq@netangola.com

SQAM STRUCTURE	NMI, LMO and NSB in same organization
LAW	New Weights and Measures Act submitted to Minister of Industry and Ministers Council. Requires traceability to National Measurement Standards (NMSs).
METROLOGY	NMSs in mass and volume being acquired



BOTSWANA

Surface area 581 730 km²
Population 1 611 021



NATIONAL METROLOGY INSTITUTE

BOTSWANA BUREAU OF STANDARDS (BOBS)
Private Bag BO 0048, Gaborone, Botswana
Tel +267 564044 Fax +267 564042 Email ceo@bobstandards.bw

SQAM STRUCTURE	NMI, LMO and NSB in same organization.
LAW	Weights and Measures Act of 1970 exist. New legislation being prepared.
METROLOGY	National Measurement Standards exist. New laboratory facilities for them are being designed.



DRC

Surface area 2 435 409 km²
Population 49 300 000



NATIONAL METROLOGY INSTITUTE

OFFICE CONGOLAIS DE CONTROLE (OCC)
B P 8806 Kin 1, Kinshasa, Democratic Republic of Congo
Tel +24 312 21177 Fax +24 312 21974 E-mail occ-dir@t.cd

SQAM STRUCTURE	NMI, LMO and NSB in same organization.
LAW	Ordinance of 1974 creating OCC. Proclamation of 1910 establishing metric system.
METROLOGY	Legal Metrology standards exist.



LESOTHO

Surface area 30 355 km²
Population 2 143 141



NATIONAL METROLOGY INSTITUTE

Non-existent, contact:

Chief Standards Officer
Ministry of Trade and Industry
P O Box 747, Maseru, Lesotho
Tel + 266 320 695 Fax + 266 310 326 E-mail lessqa@leo.co.ls

SQAM STRUCTURE	Under development
LAW	No specific laws on metrology in place.
METROLOGY	No National Measurement Standards or Legal Metrology standards exist.



MALAWI

Surface area 118 484 km²
Population 10 000 000



NATIONAL METROLOGY INSTITUTE

MALAWI BUREAU OF STANDARDS (MBS)
P O Box 946, Blantyre, Malawi
Tel +265 670 488 Fax +265 670 756 E-mail askhulumula@malawi.net

SQAM STRUCTURE	NMI, LMO and NSB in same organization.
LAW	Weights and Measures Act of 1959 exists as well as Metrication Act of 1981.
METROLOGY	National Measurement Standards and Legal Metrology standards exist.



MAURITIUS

Surface area 2040 km²
Population 1 180 000



NATIONAL METROLOGY INSTITUTE

MAURITIUS STANDARDS BUREAU (MSB)
Villa Road, Moka, Mauritius
Tel +230 433 3648 Fax +230 433 5051E-mail msb@intnet.mu

SQAM STRUCTURE	NMI and NSB in same organization, LMO and MAB separate.
LAW	Legal Metrology Act of 1985 and Standards Act of 1993 exist.
METROLOGY	National Measurement Standards and Legal Metrology standards exist.



MOZAMBIQUE

Surface area 799 380 km²
Population 16 800 000



NATIONAL METROLOGY INSTITUTE

NATIONAL INSTITUTE FOR STANDARDIZATION AND QUALITY (INNOQ)
C. P. 2983, Maputo, Mozambique
Tel +258 1 303 822 Fax +258 1 303 658 E-mail innoq@emilmoz.com

SQAM STRUCTURE	NMI, LMO and NSB in same organization.
LAW	One regulation from 1968 exists, which needs to be implemented.
METROLOGY	National Measurement Standards for mass and volume have been established.



NAMIBIA

Surface area 824 269 km²
Population 1 770 000



NATIONAL METROLOGY INSTITUTE

DIVISION OF WEIGHTS AND MEASURES
MINISTRY OF TRADE AND INDUSTRY
P O Box 729, Windhoek, Namibia
Tel +264 61 238694 Fax +264 61 254566 E-mail nsiq@mti.gov.na

SQAM STRUCTURE	LMO is de facto NMI at present.
LAW	Measuring Units and National Measuring Standards Act (Act 76 of 1973) and Trade Metrology Act (Act 77 of 1973).
METROLOGY	Trade metrology standards exist.



SEYCHELLES

Surface area 455.3 km²
Population 77 700



NATIONAL METROLOGY INSTITUTE

SEYCHELLES BUREAU OF STANDARDS
P O Box 953, Victoria, Mahe, Seychelles
Tel +248 375333 Fax +248 375151 E-mail sbsorg@seychelles.net
<http://www.seychelles.net/sbsorg>

SQAM STRUCTURE	NMI, LMO and NSB in same organization.
LAW	<ul style="list-style-type: none"> Weights and Measures Act (Act 25 of 1981) Weights and Measures Regulations (S.I. 59 of 1981).
METROLOGY	Trade Metrology standards and National Measurement Standards exist.



SOUTH AFRICA

Surface area 1 221 000 km²
Population 43 100 000



NATIONAL METROLOGY INSTITUTE

CSIR – National Metrology Laboratory
P O Box 395, Pretoria 0001, South Africa
Tel +27 12 8413139 Fax +27 12 841-2131 E-mail bfdenner@csir.co.za
<http://www.nml.csir.co.za>

SQAM STRUCTURE	NMI separate institution, LMO and NSB single institution, NAB separate institution.
LAW	Measuring Units and National Measuring Standards Act (Act 76 of 1973) and Trade Metrology Act (Act 77 of 1973).
METROLOGY	Trade Metrology standards and National Measurement Standards exist.



SWAZILAND

Surface area 17 364 km²
Population 966 000



NATIONAL METROLOGY INSTITUTE

MINISTRY OF ENTERPRISE AND EMPLOYMENT
METROLOGY DIVISION
P O Box 451, Mbabane, Swaziland
Tel +268 40 43 201 Fax +268 40 43 833

SQAM STRUCTURE	LMO is de facto NMI at present.
LAW	Metrology Act No. 12 of 1991 and Measuring Units Regulation.
METROLOGY	Trade Metrology standards exist.



TANZANIA

Surface area 945 200 km²
Population 32 000 000



NATIONAL METROLOGY INSTITUTE

TANZANIA BUREAU OF STANDARDS (TBS)
P O Box 9524, Dar-es-Salaam, Tanzania
Tel +255 222 450298 Fax +255 222 450983

SQAM STRUCTURE	NMI, LMO and NSB are separate institutions.
LAW	Act 3 of 1975
METROLOGY	National Measurement Standards and Trade Metrology standards exist.



ZAMBIA

Surface area 752 612 km²
Population 10 400 000



NATIONAL METROLOGY INSTITUTE

ZAMBIA BUREAU OF STANDARDS (ZABS)
P O Box 50259, Lusaka, Zambia
Tel +260 1 236 133 Fax +260 1 238 483 E-mail zabs@zamnet.zn

SQAM STRUCTURE	NMI and NSB are in same institution, LMO is separate.
LAW	Weights and Measures Act Cap 403, volume 23
METROLOGY	National Measurement Standards and Trade Metrology standards exist.



ZIMBABWE

Surface area 390 757 km²
Population 13 100 000



NATIONAL METROLOGY INSTITUTE

SIRCD – NATIONAL METROLOGY INSTITUTE
P O Box 6640, Harare, Zimbabwe
Tel +263 4 860321 Fax +263 4 860350 E-mail bmathe@sirdc.ac.zw

SQAM STRUCTURE	NMI, LMO and NSB are separate institutions.
LAW	Trade Measures Act (CAP) 14:23.
METROLOGY	National Measurement Standards and Trade Metrology standards exist.

CATEGORY	DESCRIPTION	COUNTRIES
A	Non-existing No metrology facilities.	Lesotho
B	Rudimentary Some metrology facilities. Some elements of SQAM legislation.	Angola DRC Mozambique Namibia Swaziland
C	Existing Established Trade Metrology system. Some National Measurement Standards. Traceable standards.	Botswana Malawi Seychelles Tanzania Zambia Zimbabwe
D	Almost measurement Engaged in accreditation process. Participation in regional or international comparisons.	Egypt Mauritius Uganda
	Measurement Measurement services accredited by internationally recognized accreditation body. Comprehensive SQAM legislation.	Kenya
E	Reference Signatory to MRA between NMIs. CMC's in BIPM MRA database. Realization of primary standards. NMI experts serve on CIPM Consultative Committees.	South Africa

PROPOSED SADC PROJECT

A project proposal is currently being prepared for a donor funded regional SQAM project of about \$ 20 Million.

The objective is the establishment of a basic, but internationally recognized, standards and conformity assessment infrastructure in all SADC countries.

Project elements will involve a common regulatory framework, harmonized standards, a regional accreditation system and an accredited network of testing and calibration laboratories.

WATCH THIS SPACE

<http://www.sadc-sqam.org>