

Overview of malaria control activities and programme progress

Malaria is a major public health problem in Zambia with an estimated 3 million clinical cases per year based on reported malaria, with the most affected populations being pregnant women and children.

Malaria control is a priority. Since 2000 and the inception of RBM at the country level, Zambia has, among other things, put in place a national RBM strategy, revised the antimalarial drug policy based on evidence, conducted an inventory of laboratory services for malaria and had two successful proposals from the GFATM. Other achievements include strengthening institutional infrastructure and staffing, the revival of the indoor residual spraying programme, and establishing a sentinel surveillance system, with outputs on monitoring antimalarial drug efficacy and vector responses to insecticides. Monitoring activities have been supplemented with household surveys to assess the status of intervention coverage and there has been active collaboration with partners, including private, public and religious organizations.

Many strategies are currently being implemented for enhanced malaria control including: (i) prompt and effective treatment; (ii) epidemic preparedness and response; (iii) vector control; (iv) provision for malaria prevention during pregnancy, and (v) information, education and communication materials for malaria prevention and awareness.

Challenges that the NMCP faces in the near future include the deployment and monitoring of ACTs as first-line treatment and coordination of ITN delivery systems for effective scale up of control programmes. These major challenges are accompanied by attrition and high turnover among malaria control staff. In the near term, the way forward for activities related to scaling up include, among other things, focusing initially on indoor residual spraying by scaling up in two additional districts (for a total of nine) and coordinating nationwide school and antenatal clinic ITN delivery strategies.

National malaria policy and strategy environment

National malaria strategy overview for 2003

	Strategy
Treatment and Diagnosis Guidelines Published/updated in	
Monitoring antimalarial drug resistance Number of sites currently active	Yes 11
Home management of malaria	Yes
Vector control using insecticides	Yes
Monitoring insecticide resistance Number of sites currently active	Yes
Insecticide-treated mosquito nets (ITNs)	Yes
Intermittent preventive treatment (IPT)	Yes
Epidemic preparedness	Yes

Current antimalarial drug policy

	Current policy
Uncomplicated malaria	
<i>P. falciparum</i> (unconfirmed)	ATM-LUM
<i>P. falciparum</i> (lab confirmed)	ATM-LUM
<i>P. vivax</i>	
Treatment failure	Q(7d)
Severe malaria	Q(7d)
Pregnancy	
Prevention	SP (IPT)
Treatment	

EPIDEMIOLOGICAL DATA

Following WHO recommendations, malaria case reporting is carried out in most countries. The data presented below reflect aggregated malaria cases at the national level and are presented by gender, age and subnational level as submitted to WHO. Malaria reporting from national surveillance systems varies in quality and reporting completeness and may have limited value in understanding the actual malaria burden, but may be useful for understanding trends in the relative burden of malaria in the public health sector.

Reported malaria cases (annual)

1990	1991	1992	1993	1994	1995	1996	1997	1998	1999
1 933 696	2 340 994	2 953 692	3 514 000	3 514 000	2 742 118	3 215 866		3 399 630	2 992 203
2000	2001	2002	2003						
1 139 489	2 010 185			Date of last report:					

Reported malaria by type and quality

For most recent year

Reported malaria cases	2 010 185
Reported malaria deaths	5 763

Probable or clinically diagnosed

Malaria cases	2 010 185
Severe (inpatient or hospitalized) cases	162 709
Malaria deaths	5 763

Slides taken
Rapid diagnostic tests (RDTs) taken

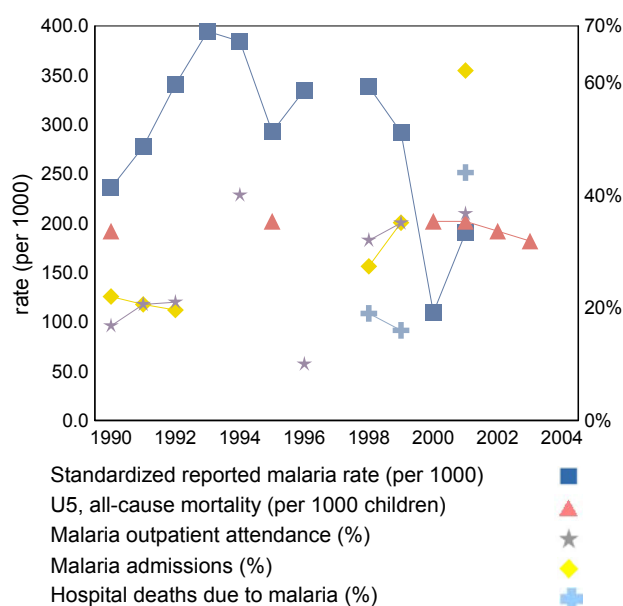
Laboratory confirmed

Malaria cases	
<i>P. falciparum</i> or mixed	
<i>P. vivax</i>	
Severe (inpatient or hospitalized) cases	
Malaria deaths	

Investigations

Imported cases

Estimated reporting completeness (%)



Reported malaria cases by age and gender

Group	Subgroup	2000	2001	2002	2003	%
	Total	1 139 489	2 010 185			100
Age	<5 years	696 007				61
	5> years	443 482				39

Reported malaria cases by selected subnational area

2000	2001	2002	2003	%
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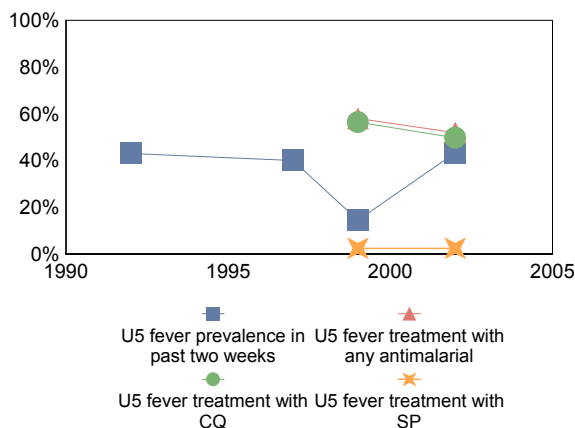
COVERAGE OF ROLL BACK MALARIA INTERVENTIONS

Information related to the coverage of RBM key interventions is presented here. This includes coverage of antimalarial treatment, possession and use of insecticide-treated nets (ITNs), and use of intermittent preventive treatment (IPT) among pregnant women (PW) where national policy indicates.

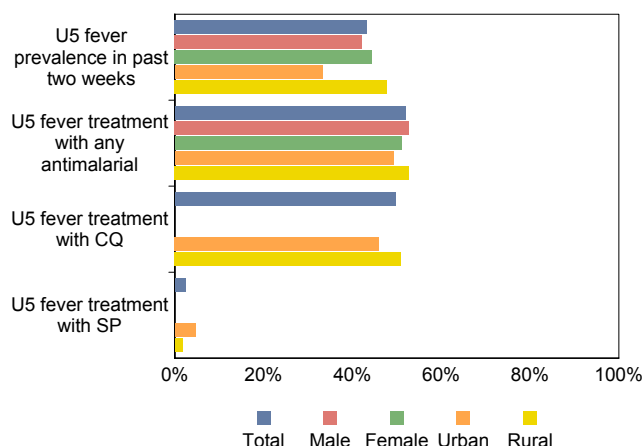
Fever prevalence and treatment with antimalarials

Prompt access to effective treatment is one of the key interventions promoted by RBM. Information presented below is from household surveys on fever prevalence and reported treatment of fever with antimalarials among children under 5 years of age (U5) within the previous 2 weeks.

Trend in fever prevalence and antimalarial coverage estimates from national surveys



Estimate of fever prevalence and treatment with antimalarials from most recent national survey



Available national surveys

DHS 2001-02

Sample size (U5s): 5 787
Field work: Nov 2001-May 2002
Scale: national
Supporting organization: Macro DHS

MICS 1999

Sample size (U5s): 6 217
Field work: Oct 1999
Scale: national
Supporting organization: UNICEF

DHS 1996-97

Sample size (U5s): 6 109
Field work: Jul 1996-Jan 1997
Scale: national
Supporting organization: Macro DHS

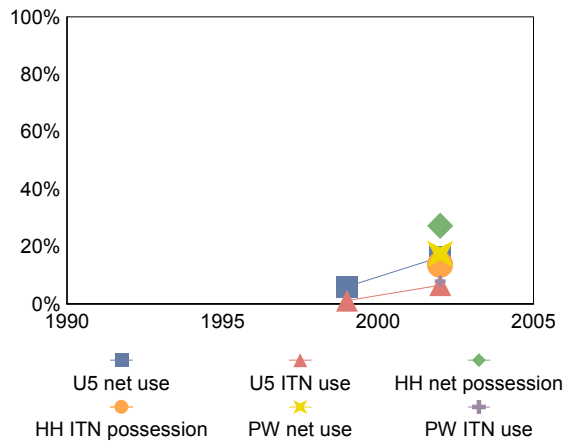
DHS 1992

Sample size (U5s): 5 396
Field work: Jan-May 1992
Scale: national
Supporting organization: Macro DHS

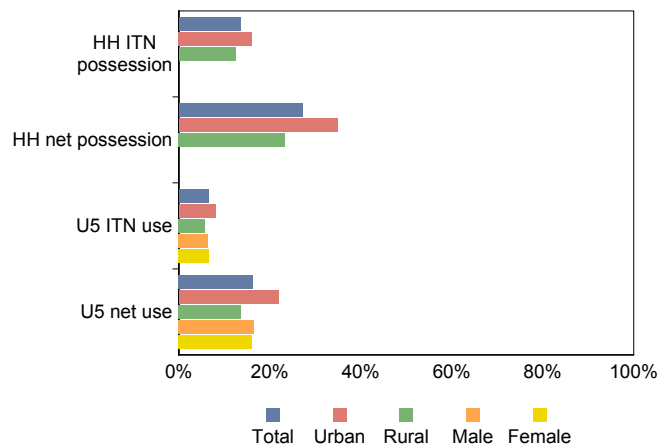
Insecticide-treated nets

ITNs are one of the key interventions promoted by RBM. Coverage of ITNs is best assessed through household (HH) surveys which ask questions on possession and use of nets, as well as insecticide treatment status, among the target populations of children under 5 years of age (U5) and pregnant women. Data below represent available household survey results in which household possession and use of nets and ITNs have been assessed.

Trend in mosquito net coverage estimates from national surveys



Estimates of ITN coverage from most recent national survey



Available national surveys

DHS 2001-02

Sample size (HHs or U5s): 7 126 Supporting Organization: Macro DHS
 Field work: Nov 2001-May 2002
 Scale: national

MICS 1999

Sample size (HHs or U5s): 6 217 Supporting Organization: UNICEF
 Field work: Oct 1999
 Scale: national

Available sub-national surveys

RBM 2001

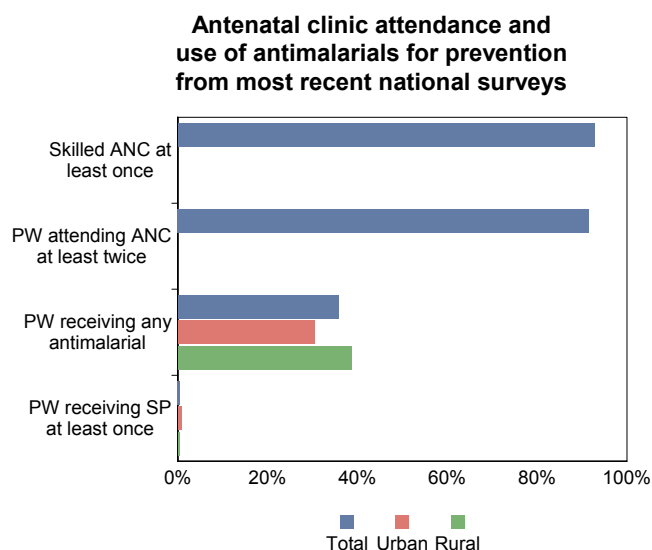
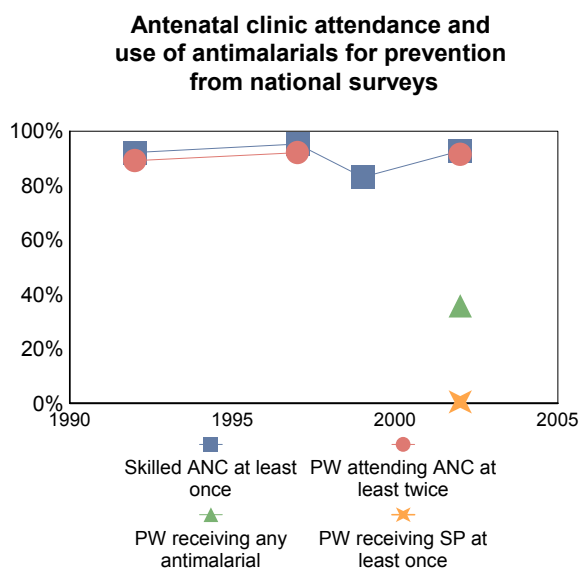
Sample size (HHs or U5s): 4 692 Supporting Organization: WHO/AFRO
 Field work:
 Scale: 10 districts: Chbombo, Chingola, Chipata, Chongwe, Isoka, Kalomo, Kaputa, Mwinilunga, Samfya, Senanga

NetMark 2000

Sample size (HHs or U5s): 1 470 Supporting Organization: NetMark
 Field work: Oct 2000
 Scale: 5 areas: Lusaka, Kitwe, Mansa, Choma, Kaoma

Intermittent preventive treatment during pregnancy

RBM promotes IPT with SP in countries with areas of stable malaria transmission as one of its key prevention strategies for pregnant women (PW). However, few surveys have assessed the coverage of IPT among pregnant women. Data below represent available household survey results in which indicators related to monitoring IPT have been assessed. The level of skilled antenatal attendance and the percentage of women attending antenatal clinics (ANC) at least twice are presented as a background for which improvements in IPT can be achieved.



Available national surveys

DHS 2001-02

Sample size (PW): 4 402 Supporting organization: Macro DHS
 Field work: Nov 2001-May 2002
 Scale: national

MICS 1999

Sample size (PW): 363 657 Supporting organization: UNICEF
 Field work: Oct 1999
 Scale: national

DHS 1996-97

Sample size (PW): 4 449 Supporting organization: Macro DHS
 Field work: Jul 1996-Jan 1997
 Scale: national

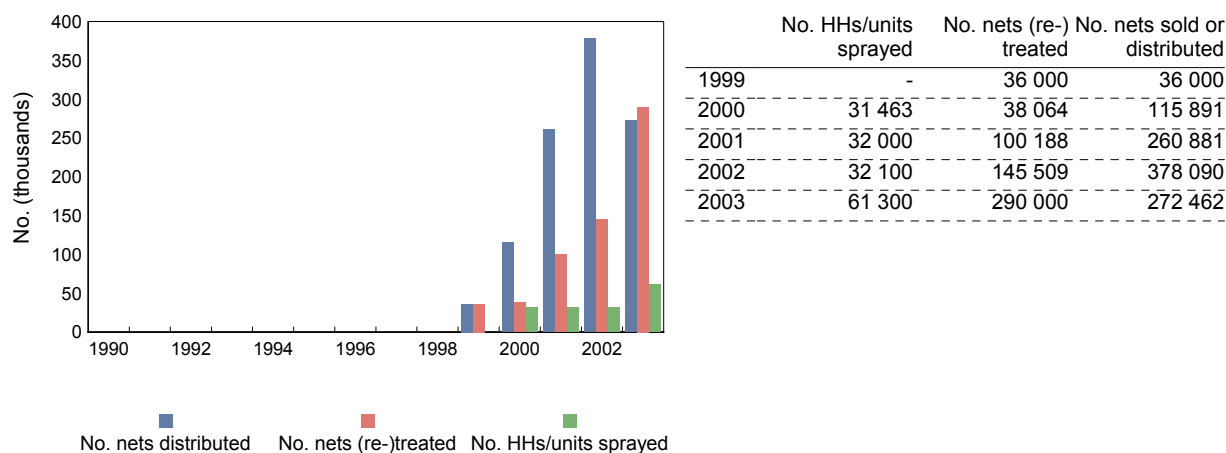
DHS 1992

Sample size (PW): 4 064 Supporting organization: Macro DHS
 Field work: Jan-May 1992
 Scale: national

SERVICE DELIVERY AND MALARIA-RELATED COMMODITIES

General malaria-related services delivered

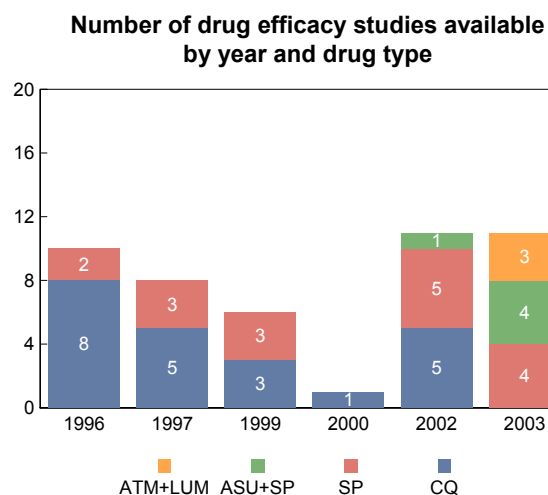
Services delivered for malaria control include numbers of nets and insecticides delivered or sold, numbers of nets (re-)treated with insecticide and numbers of households (HHs)/units sprayed during IRS campaigns. These services and service-related commodities mostly reflect core malaria control activities of national malaria control programmes. The information reflects annual, country-reported data.



MONITORING ANTIMALARIAL DRUG EFFICACY

Monitoring antimalarial drug efficacy is important for understanding the impact of antimalarial treatment being delivered and the need for drug policy change, essential for ensuring prompt access to effective treatment. Median, range and quartiles are based on percentage clinical failure for uncomplicated *P. falciparum* malaria for countries in Africa south of the Sahara, and percentage total failure for all other areas. Included are studies that used WHO protocol among selected drugs.

Study years	Number of studies	Median	Range		Percentile	
			Low	High	25th	75th
CQ						
1996-2002	22	31.9	6.6	54.0	24.6	46.3
SP						
1996-2003	17	7.9	0.0	17.9	3.3	14.2
ATM+LUM						
2003	3	0.0	0.0	0.0	0.0	0.0
ASU+SP						
2002-2003	5	0.0	0.0	1.7	0.0	0.9



FINANCING FOR MALARIA

Annual funding for malaria control

This information represents country-reported national and other resources budgeted or spent for national malaria control programme efforts. If information was reported in a different currency than US\$, the annual average of the official exchange rate from the World Development Index was used for conversion. Currency is presented in US\$ (thousands).

No data are currently available.

Malaria funds from the Global Fund to Fight HIV, Tuberculosis, and Malaria

Information on additional resources provided to countries through GFATM from 2-year committed funds for malaria from successful proposals through the first four rounds is presented. The details on approved proposals, grant agreements and disbursements to date are provided. Figures are presented in US\$. These data are maintained and updated by GFATM.

Approved proposals			Grant agreements and disbursements (as of 13 January 2005)						
Source	Round	Total year 1-2 budgets	Principal recipient	Signed	Signature date	Grant amount	No. of disbursements	Total disbursed	% disbursed
CCM	1	17 891 800	MoH	Yes	15-Aug-03	17 039 200	3	13 132 517	77.1%
CCM	4	20 279 950		No			-		

General notes and remarks

See explanatory notes at the beginning of the section.