

# ROLL BACK MALARIA IN CENTRAL ASIA AND KAZAKHSTAN

PROJECT DOCUMENTS

January 2002

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# **ROLL BACK MALARIA**

# PROJECT DOCUMENT

# MINISTRIES OF HEALTH OF UZBEKISTAN, TAJIKISTAN KYRGYZSTAN, KAZAKHSTAN AND TURKMENISTAN

# WORLD HEALTH ORGANIZATION REGIONAL OFFICE FOR EUROPE

Title: The Roll Back Malaria Project

Duration: 4 years, January 2002–December 2005

Project Sites: Selected districts and cities in Tajikistan, Uzbekistan, Kyrgyzstan,

Kazakhstan and Turkmenistan

Intended Beneficiaries: More than 11 000 000 indigenous people and migrants

Requesting Agency: WHO

Govt. Cooperating Agency: Ministries of Health, Tajikistan, Uzbekistan, Kyrgyzstan, Kazakhstan

and Turkmenistan

Estimated Starting Date: January 2002

Estimated Project Budget: 2002: USD 2 109 500

2003: USD 1 964 500 2004: USD 1 899 500 2005: USD 1 789 500

TOTAL (2002-2005): USD 7 763 000

# **BRIEF DESCRIPTION**

Malaria was eradicated in countries of Central Asia and Kazakhstan in the 1960s–1970s. However, as a result of the deterioration of the malaria situation in areas of Tajikistan which border Afghanistan, cases of malaria due to local transmission have occurred in Kyrgyzstan, Kazakhstan and Turkmenistan since the middle of the 1990s. In 1998, the malaria situation worsened dramatically, and a sudden outbreak of malaria was reported in the southern part of Turkmenistan. The first reported cases of autochthonous malaria in Uzbekistan occurred in 1999, and their numbers have since increased in the areas bordering with Tajikistan. The malaria situation in border areas of the abovementioned countries remains serious, and its deterioration can be expected in the future. The National Malaria Prevention and Control Programmes are at present implemented and supported by WHO and other partners/donors. However, the limited resources invested by the respective governments, WHO and others concerned result in a shortfall of funding sufficient to cope with the malaria problem in these countries.

National RBM Projects will support the countries in building RBM partnerships and working together in the promotion of health-related actions that reduce the incidence of malaria and its burden and prevent the further spread of malaria across Central Asia. The RBM Projects will focus on addressing malaria—related issues through capacity building, improving capacities for and access to early diagnosis/adequate treatment and timely response to and prevention of malaria outbreaks, reinforcing surveillance mechanisms, and increasing community awareness and involvement in malaria prevention. Implementation of the RBM Projects will be a collaborative effort of the Ministries of Health in cooperation with WHO and other existing/potential partners and donors. The projects are planned for a period of 4 years (2002-2005). The project will have a strong but flexible management structure, capable of mobilizing the partnership among UN agencies and NGOs as well as the media and other partners/donors in implementing cost–effective but technically sound and sustainable malaria control measures adapted to the countries' conditions and responding to local needs.

### I. HISTORICAL CONTEXT

The new Director General of WHO committed herself to an intensive response to the global malaria burden and proposed the *Roll Back Malaria Initiative (RBM)* in January 1998. A global coalition to Roll Back Malaria, characterized by strategic synergy, coordinated effort, and science-based strategies, was proposed at the World Health Assembly in 1998. The Global Partnership to RBM, consisting of WHO, UNICEF, UNDP, World Bank and a group of National Government representatives, heads of bilateral donor organizations, representatives of private sector and non-governmental bodies was formally established in December 1998. Members of the Global RBM Partnership are committed to supporting country-level efforts that are led by national authorities within the context of their multisectoral strategies for development and poverty alleviation.

A meeting to establish a partnership for Roll Back Malaria in the Central Asian Republics was held in Tashkent, Uzbekistan in July 1999. Commitment to build up the RBM Partnership in Central Asian countries was the main outcome of the meeting. The National RBM Projects will support their respective countries in partnership building and working together in the promotion of health sector actions that reduce the incidence of malaria and its burden, and prevent further spread of malaria within the Central Asian Region.

The malaria problem may become a major obstacle to developing countries of Central Asia and Kazakhstan, where at present between 15 - 20 million people, or more than 30 per cent of the total population, lives in areas at risk of malaria (see Annex 1). During 1999–2000, the number of autochthonous cases of malaria continued to rise. The explosive epidemic/outbreaks of malaria in Tajikistan/Turkmenistan and the re–establishment of malaria transmission, with the occurrence of autochthonous malaria cases in other countries, have occurred as a result of civil unrest and massive cross–border population movements, as well as disruption of the countries' capacities to implement appropriate malaria control.

Malaria control and prevention programmes in countries of Central Asia are funded by the respective governments, WHO, and other donors and partners. However, at present resources invested for malaria control are limited, and the country is in need of additional external assistance to cope with the malaria problem.

### II. THE CURRENT MALARIA SITUATION

Malaria was eradicated in countries of Central Asia and Kazakhstan in the 1960s–1970s. However, as a result of the deterioration of the malaria situation in Tajikistan, cases of malaria due to local transmission have occurred in Kyrgyzstan, Kazakhstan and Turkmenistan since the middle of the 1990s. In 1998, the malaria situation worsened sharply, and a sudden outbreak of malaria was reported in the southern part of Turkmenistan. The first reported cases of autochthonous malaria in Uzbekistan occurred in 1999, and their numbers have since increased in the areas bordering Tajikistan. The malaria situation in border areas of the above countries remains serious, and its deterioration can be expected in the future (see Annexes 2, 3, 4 & 5).

# III. HOST COUNTRIES' STRATEGIES

All countries in Central Asia and Kazakhstan have committed themselves to malaria control, and in 1999-2000, the national health authorities, in collaboration with EURO/WHO, developed the National Malaria Prevention and Control Programmes which are presently being implemented. The four elements of the Programmes are as follows:

**Disease Prevention:** to plan and implement sustainable preventive measures

**Disease Management:** to provide early diagnosis and prompt treatment

**Epidemic Control:** to detect early outbreaks and prevent the further spread of malaria

epidemics

**Programme Management:** to strengthen institutional capacities of the National Malaria Control

Programme and surveillance mechanisms.

# IV. PROJECT JUSTIFICATION

In face of the grave malaria situation in Tajikistan, a recent malaria outbreak in Turkmenistan, the reestablishment of malaria transmission in Uzbekistan, Kyrgyzstan and Kazakhstan, and the real threat of a resumption of malaria transmission in areas where malaria had been eradicated many years ago, the focus of the Project will be an attempt to change this unfavourable trend. The practical, technical and operational modalities on dealing with malaria by specialized services and the public health sector, as well as the community itself, are to be the expected outcomes of the national RBM Projects funded by a number of international agencies/organizations and implemented by the respective governments. The projects will have a strong but flexible management structure capable of mobilizing the partnership among the Ministry of Health, UN agencies and other donor agencies and countries, NGOs, and the media in implementing cost-effective but technically sound and sustainable malaria control measures adapted to the country's conditions and responding to local needs.

# V. PROBLEMS TO BE ADDRESSED

# Problem I:

A wide range of malaria-related problems in countries of Central Asia may be witnessed - starting from a progressive return of endemicity in the southern part of Tajikistan; outbreaks of malaria in the central, western and northern parts of Tajikistan; the deterioration of the malaria situation in the areas of Uzbekistan and Kyrgyzstan which border Tajikistan; the occurrence and increase in the number of autochthonous malaria cases in Uzbekistan, Kyrgyzstan and Kazakhstan, and the unstable malaria situation in Turkmenistan.

### **Problem II:**

Shortages of insecticides and limited use of antilarval operations result in a limited impact of vector control operations.

# **Problem III:**

Health facilities which are under-equipped and poorly supplied result in an inadequate quality of disease management and prevention.

# **Problem IV:**

There is a lack of malaria surveillance, particularly at peripheral levels.

# **Problem V:**

Communities' lack of knowledge and skills to prevent themselves from malaria results in scant use of personal protective measures.

# **Problem VI:**

Limited resources invested by the government and external donors result in a lack of proper funding to cope with the malaria problem and its spread throughout the territory of the Central Asian Region.

### VI. TARGET LOCATIONS AND INTENDED BENEFICIARIES

From 2002-2005, assistance will be provided to selected regions and districts in Tajikistan, Uzbekistan, Kyrgyzstan, Kazakhstan and Turkmenistan. Generally speaking, the target beneficiaries will be represented by 13 million indigenous people and migrants entering these areas for various reasons.

### VII. SUCCESS IMPACT INDICATORS

A base-line survey conducted in project areas will provide an assessment of malaria-related problems and needs at the beginning of the project, whereas a terminal evaluation at the conclusion of the project will bring to light improvements in the malaria situation which have occurred as a result of interventions.

In the short and medium term, the project is likely to prevent malaria deaths, reduce the incidence of malaria, particularly P. falciparum in Tajikistan and prevent a resumption of malaria transmission in other areas of the region which are at present are free from malaria. Sustaining the project activities beyond 2005 could interrupt transmission of P. falciparum malaria in Tajikistan and consolidate further the results achieved in other countries of the Region.

### VIII. PROJECT STRATEGY AND PRIORITY INTERVENTIONS

The above will be addressed by actions in specific priority areas, all of which are in line with the following strategic components of the Projects and incorporated into the four elements of the National Action Plans for Malaria Control and Prevention:

Component I (All Countries): STRENGTHENING INSTITUTIONAL CAPACITIES OF THE NATIONAL MALARIA CONTROL PROGRAMME/GENERAL **HEALTH SERVICES AND ENHANCING CAPACITY FOR DECISION-MAKING RELATED TO MALARIA AND ITS CONTROL/PREVENTION** 

To be effective, the national plan of actions for malaria prevention and control should be implemented through properly organized and managed specialized and general health services. To facilitate the execution of the RBM projects in respective countries, some important aspects in the implementation and management of malaria prevention and control programmes, notably responsibility, authority and accountability for work done, resources used and outputs/outcomes produced at all levels should be reviewed. To provide adequate technical and operational guidance in a satisfactory manner, health staff of specialized health services should be trained in programme management. Technical assistance and back-up will be provided by WHO staff.

# Component II (All Countries): BUILDING UP RBM PARTNERSHIP

RBM will address malaria as a priority health issue within the context of sustainable health sector development in respective countries. WHO will provide strategic direction, coordination and technical/financial support for malaria control interventions under RBM. Other partners involved in the RBM Projects will mobilize additional funds for RBM interventions.

# Component III (All Countries): IMPROVING CAPACITIES FOR AND ACCESS TO EARLY DIAGNOSIS AND ADEQUATE TREATMENT OF MALARIA

An established and properly functioning system for the identification of cases, reliable and early diagnosis, and effective and prompt treatment and follow-up of treatment results comprise fundamental parts of the projects. Since the microscopic examination remains the most reliable and least expensive way to diagnose malaria, diagnostic laboratory facilities will be upgraded within project areas.

# <u>Component IV</u> (All Countries): IMPROVING CAPACITIES FOR THE TIMELY RESPONSE TO AND PREVENTION OF MALARIA EPIDEMICS

All epidemic-prone areas will be identified and potential situations forecasted within project areas. Emergency preparedness for and mechanisms of response to malaria epidemics will be improved. Contingency plans for epidemic control, including indoor spraying, will be worked out and a reserve of drugs, insecticides and spraying equipment will be maintained for rapid deployment. Basic Health Staff will be trained to recognize epidemic situations and build up community preparedness.

# **Component V** (Tajikistan): PROMOTING COST-EFFECTIVE AND SUSTAINABLE VECTOR CONTROL

To reduce transmission of malaria and its incidence, biological vector control measures will be applied and encouraged through health education in project areas. All the above preventive measures will be guided by consideration of its technical and operational feasibility, effectiveness and sustainability.

# Component VI (All Countries): CAPACITY BUILDING

Training is a key component of the project. In–service training in disease management and prevention will be conducted for all categories of specialized programme and public health personnel within project areas. Laboratory personnel will be trained in malaria microscopy. Basic training will be supplemented by regular supervision and refresher training courses. Training will be practical in nature and directed towards developing skills and competence.

# Component VII (All Countries): REINFORCING RBM COUNTRY SURVEILLANCE MECHANISM

A base-line survey to assess problems and needs related to malaria will be carried out at the beginning of the projects. Mechanisms for the regular collection, processing and analysis of operational, epidemiological and socio-economic data relevant to planning/re-planning, implementation, monitoring and evaluation of the project activities will be built in. The existing reporting and information system will be improved. The survey data will provide a systematic way to determine whether the project approaches and interventions and other inputs are appropriate and sufficient to achieve the stated targets and objectives.

# <u>Component VIII</u> (All Countries): INCREASING COMMUNITY AWARENESS & PARTICIPATION IN MALARIA CONTROL/PREVENTION

The involvement of communities and their partnership with the formal and informal health sectors to empower them in their own health development is crucial. People should be educated about malaria and its control/prevention and have access to adequate health care facilities. The existing treatment practices will be improved through development and dissemination of clear messages on malaria and its treatment. Community and family care and preventive practices will be strengthened through providing IEC materials, skills building, traditional/mass media and community support. KAP assessments will conducted on ways to promote compatibility of practices, customs and beliefs of various social groups and minorities with existing malaria control/prevention options, and develop effective IEC strategy and targeted IEC materials.

# Component IX (All Countries): STRENGTHENING RESEARCH CAPABILITIES

Operational research is essential for planning, implementation and evaluation of the project activities and will be an integral part of the projects. Such research will address not only the planning and effectiveness of specific interventions, but also cultural, behavioural, social and economic factors that might affect the project interventions and outcomes.

# Component X (Tajikistan): TARGETED SEASONAL MASS DRUG ADMINISTRATION

Seasonal chemoprophylaxis could be applied in the form of mass drug administration in order to reduce transmission of malaria in persistent foci by destroying/damaging sexual forms of the malaria parasites in the blood of infected persons. This could be achieved by applying gametocidal—oriented drugs (chloroquine – against *P. vivax malaria*, and primaquine – against *P. falciparum* malaria). The timeline of its application would coincide with the period of mosquito effectiveness. Since numerous difficulties attend the use of mass drug administration, its value and procedure, including method of distribution, timing and means of supervision would be adopted only with very careful consideration.

# Component XI: (All Countries): ENHANCING INTERSECTORAL COLLABORATION

Additional resources for malaria control remain severely constrained. The social, economic and environmental problems posed by malaria exceed the jurisdiction and capabilities of the Ministry of Health. There is obviously a need for improved intersectoral collaboration, as well as for planning and information sharing, to ensure that additional funds are earmarked for malaria control. Such collaboration is best developed on the basis of a shared understanding of the underlying problems to be addressed. Information on development activities and the migration of organized and non-organized population groups will be collected and exchanged amongst all parties concerned. The Ministry of Health will stimulate the non-health sectors for active collaboration in malaria control, including the mobilization of additional funds. National multi–sectoral committees will promote coordination and collaboration in malaria control activities among all concerned.

# <u>Component XII:</u>(All Countries): IMPROVING INTER – COUNTRIES COORDINATION IN BORDER AREAS

Current malaria situations in border areas have deteriorated in recent years, and there are expectations that the border problems may assume larger dimensions in the near future. All necessary steps should be taken to improve coordination among neighbouring countries for solving common problems in the control and prevention of malaria. Particular emphasis should be placed on malaria situations and identifications of problems/constraints encountered, a direction and strategy for increased coordination of malaria control, modalities for regular exchange of relevant information and joint action plans and actions in order to coordinate and synchronize malaria control and preventive activities in border areas.

# IX. PROJECT DEVELOPMENT AND SPECIFIC OBJECTIVES

The development objective is to prevent deaths due to malaria, prevent malaria outbreaks, reduce the incidence of malaria, prevent the further spread of malaria to areas where malaria had previously been eradicated, and to minimize the socio–economic losses provoked by the disease through the progressive strengthening of the capacities and capabilities of health services and mobilizing community actions within the context of the Roll Back Malaria Initiative in countries of Central Asia and Kazakhstan.

Specific objectives at sub-regional level are as follows:

# **Specific Objective I:**

IMPROVED INFORMATION EXCHANGE ON MALARIA SITUATION AND ITS CONTROL/PREVENTION IN BORDER AREAS

# **Specific Objective II:**

DEVELOPED JOINT ACTION PLANS AND COORDINATED MALARIA CONTROL AND PREVENTIVE ACTIVITIES IN BORDER AREAS

Specific objectives at country level are as follows:

# **Specific Objective I:**

STRENGTHENED INSTITUTIONAL CAPACITIES OF NATIONAL MALARIA CONTROL PROGRAMMES/GENERAL HEALTH SERVICES AND ENHANCED NATIONAL CAPACITIES FOR DECISION-MAKING RELATED TO MALARIA

# **Specific Objective II:**

BUILT UP RBM ADVOCACY AND PARTNERSHIPS

# **Specific Objective III:**

IMPROVED CAPACITIES FOR AND ACCESS TO EARLY DIAGNOSIS AND RADICAL TREATMENT OF MALARIA

# **Specific Objective IV:**

IMPROVED CAPACITIES FOR THE TIMELY RESPONSE TO AND PREVENTION OF MALARIA OUTBREAKS

# **Specific Objective V:**

PROMOTED COST-EFFECTIVE AND SUSTAINABLE VECTOR CONTROL MEASURES

### **Specific Objective VI:**

STRENGTHENED RBM COUNTRY SURVEILLANCE MECHANISMS

# **Specific Objective VII:**

INCREASED COMMUNITY AWARENESS AND PARTICIPATION IN MALARIA CONTROL AND PREVENTION

# **Specific Objective VIII:**

STRENGTHENED NATIONAL RESEARCH CAPABILITIES

# **Specific Objective IX:**

TARGETED SEASONAL MASS DRUG ADMINISTRATION

# **Specific Objective X:**

ENHANCED INTERSECTORAL COLLABORATION

# X. PROJECT MANAGEMENT AND TIMEFRAME

The project will be implemented by Ministries of Health and National Malaria Control and Prevention Programmes/Services, with technical and financial support provided by WHO and other potential donors and partners. The project management structure is as outlined below:

At the inter - country level: Focal points for the projects (Directors/ Project Managers of Malaria Control and Prevention Services from respective countries) will be responsible for the planning, implementation, evaluation and coordination of project activities in border areas of neighbouring countries.

<u>At the central country level:</u> The National Malaria Control and Prevention Programmes/Services are responsible for the implementation of project activities. Directors/ Project Managers of these structures will work in close consultation with the Ministries of Health. Personnel of the respective

programmes/services will undertake field visits to supervise the performance of work done in the field. WHO consultants will be recruited to assist in the planning, implementation and evaluation of project activities. Implementation of some project activities would be sub–contracted to international NGOs.

At the regional/district country levels: Focal points for the projects (Chiefs of Regional/District Malaria Control and Prevention Programmes/Services) will be designated for improved communication and coordination between the central and district levels. Their personnel, along with general health service staff, will be responsible for all project—related activities in their respective areas. Technical advice will be provided by specialized regional/district health personnel dealing with malaria issues.

WHO will provide overall technical backstopping and strategic co-ordination of project activities with UN agencies/NGOs and others concerned. The projects will be implemented in full consultation with all agencies and organizations involved in order to enhance coordination and maximize the impact of assistance. The projects are planned for a period of four years (2002-2005).

### XI. PROJECT MONITORING AND EVALUATION

Monitoring and evaluation will be a critical and continuous process of reviewing the project progress, problems and constraints, with the sole purpose of identifying the required areas of action for enhanced effectiveness of the projects. Comprehensive monitoring and evaluation will be carried out by the National Implementing Agency, in collaboration with WHO/EURO at regular intervals. An impact assessment surveys will be carried out at the end of the projects. Monitoring and evaluation will be based on the participation of all stakeholders.

WHO/EURO will provide technical clearance of all project documents prior to their inception. In every county, project management will prepare a project implementation plan over the first month of the start the project. The projects will be subject to annual reviews and reporting. The project final drafts will be prepared in advance to allow review and technical clearance by WHO. The project management will be responsible for the preparation and submission of project evaluation reports.

# XI. RISKS

The implementation of the RBM strategy could entail some risk. The implementation and management of the projects should be reviewed periodically to ensure they remain on track.

A continuous flow of inputs from different UN agencies and other donors is critical to the success of the RBM projects in the region. There is some risk that the funding agencies will not be able to provide and/or sustain the level of inputs required to see a visible project impact. The inadequacy of funds provided will limit the scope of the project activities.

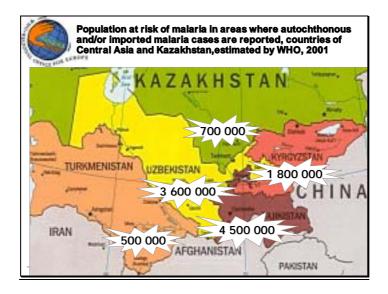
# XIII. PROJECT BUDGET

The total project budget is estimated at <u>USD 7 763 000</u>, funds which would be contributed by the Governments, WHO and other existing/potential partners/donors (see Table below). Governments will cover operational costs of the existing specialized and public health staff to be involved in implementation of project activities.

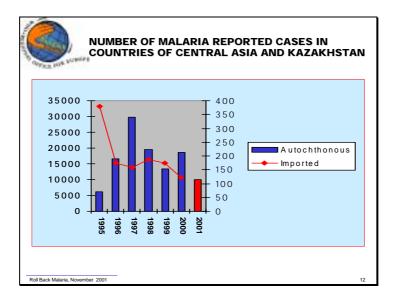
Table: Estimated Project Budget, 2002-2005

	2002	2003	2004	2005
DESCRIPTION	USD	USD	USD	USD
Technical Expertise:	002	002	002	002
International Experts	65 000	65 000	65 000	65 000
Duty Travel	75 000	75 000	75 000	75 000
Field Office (Tajikistan)	60 000	60 000	60 000	60 000
Sub-Total:	200 000	200 000	200 000	200 000
Equipment - Expendable:				
Drugs & Laboratory supplies	120 000	120 000	120 000	120 000
Insecticides/equipment for indoor spraying	540 000	540 000	540 000	540 000
Diagnostic kits and supplies	15 000	15 000	15 000	15 000
Equipment for application of antilarval measures	10 000	10 000	10 000	10 000
Mosquito nets and insecticides for impregnation	100 000	100 000	100 000	100 000
Equipment - Non-Expendable:				
Laboratory Equipment	85 000	85 000	85 000	85 000
Transportation	25 000	15 000	25 000	5 000
Office Equipment/Supplies	25 000	-	25 000	-
Sub-Total:	920 000	885 000	920 000	875 000
Quality Assessments/Assurance:				
Quality Care Assessments	30 000	30 000	30 000	30 000
Supervision & Quality Control of Laboratory	00.000	00.000	00.000	00.000
Services	30 000	30 000	30 000	30 000
Problems & Needs Assessments	25 000	-	-	-
KAP Study/	130 000	105 000	105 000	105 000
IEC Service Capacity Development				
RBM Advocacy & Partnership Building	17 700	17 500	17 500	17 500
Impact Assessment	-	-	-	25 000
Training:				
In – Service Training:	100 000	60 000	20 000	
Development & Production of training/learning materials	100 000	60 000	20 000	-
Central and intermediate levels training	110 000	95 000	80 000	70 000
Peripheral level training for public health personnel	195 000	190 000	155 000	135 000
International Training:	100 000	100 000	100 000	100 000
Training in malaria and its control	50 000	50 000	50 000	50 000
Implementation Cost	60 000	60 000	60 000	60 000
RBM Surveillance Mechanisms	10 000	10 000	5 000	5 000
Operational Research	50 000	50 000	50 000	10 000
Community Capacity Building	95 000	95 000	95 000	95 000
Monitoring / Evaluation	45 000	45 000	40 000	40 000
Miscellaneous:	.0 000	.0 000	.0 000	
Operation & Maintenance	11 000	11 000	11 000	11 000
Sundries	6 000	6 000	6 000	6 000
TOTAL:	2 109 500	1 964 500	1 899 500	1 789 500

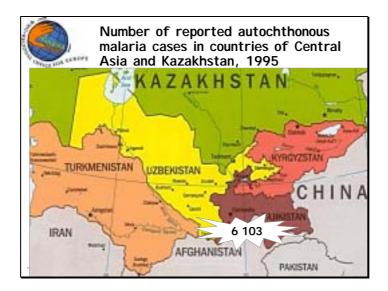
# Annex 1



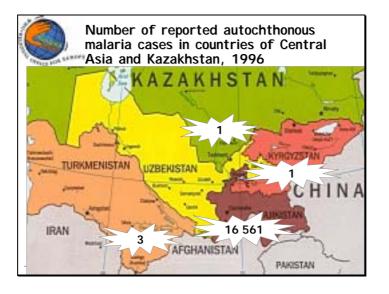
# Annex 2



# Annex 3a



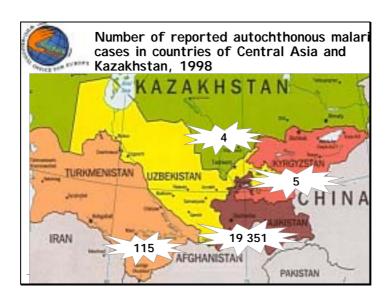
# Annex 3b



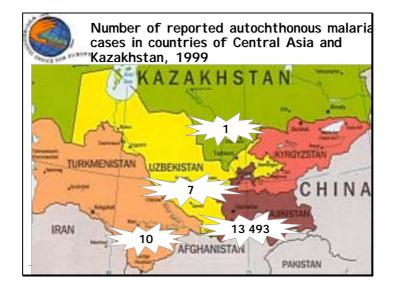
# Annex 3c



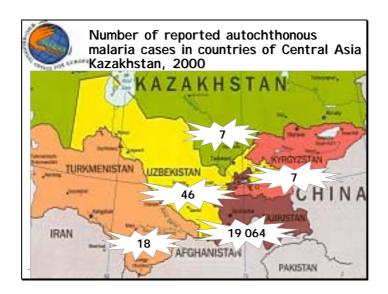
# Annex 3d



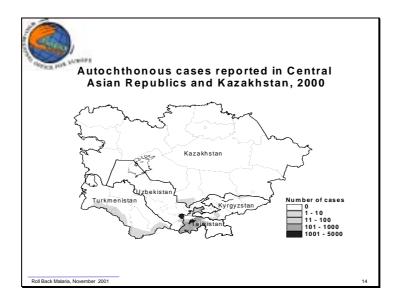
# Annex 3e



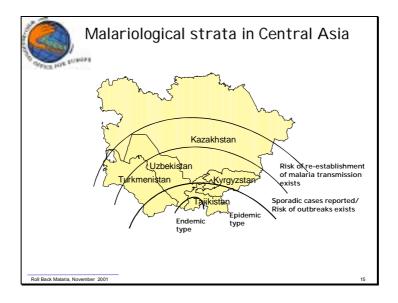
# Annex 3f



# Annex 4



# Annex 5



# **ROLL BACK MALARIA**

# **PROJECT DOCUMENT**

# MINSTRY OF HEALTH REPUBLIC OF KAZAKHSTAN

# WORLD HEALTH ORGANIZATION REGIONAL OFFICE FOR EUROPE

Title: The Roll Back Malaria Project

Duration: 4 years, January 2002 - December 2005

Project Sites: The selected districts (8) in Almatinskya, South Kazakhskay and

Dzhambul'skay Oblasts

Intended Beneficiaries: About 700 000 indigenous people and migrants

Requesting Agency: WHO

Govt. Cooperating Agency: Ministry of Health, Kazakhstan

Estimated Starting Date: January 2002

Estimated Project Budget: 2002: USD 255 500

2003: USD 230 500 2004: USD 220 500 2005: USD 205 500

TOTAL (2002-2005): USD 912 000

# **BRIEF DESCRIPTION**

The last autochthonous case of malaria was reported in 1967, and by 1968, the only cases of malaria to be reported in Kazakhstan were imported cases. Throughout the 1980s, about 40–80 imported cases were reported annually in the country. During 1991–1996, the number of malaria cases was on the decline, and only 47 cases were reported in 1999. The first case due to local transmission occurred in 1992, and sporadic cases have occurred since in the southern and north–western parts of the country. In recent years, the number of autochthonous cases has continued to rise, and there is a trend towards an increase in malaria incidence in the country. The National Malaria Control Programme is at present implemented and supported by WHO, and activities consist of disease management and prevention, training, surveillance, and vector control. However, the limited resources invested by the Government and WHO result in a lack of funding at levels sufficient to cope with the malaria problems in the country.

The RBM Project will support Kazakhstan in building partnerships and working together in the promotion of health related actions that reduce the incidence of malaria and prevent the resumption of malaria transmission in other areas of the country. The Project will focus on addressing malaria related issues through capacity building, improving capacities for and access to early diagnosis/adequate treatment and timely response to and prevention of malaria outbreaks, reinforcing surveillance mechanisms and increasing community awareness and involvement in malaria prevention. Implementation of the RBM Project will be a collaborative effort of the Ministry of Health in cooperation with WHO and other potential partners/donors. The project is planned for an initial period of four years (2002-2005). The project will have a strong but flexible management structure capable of mobilizing the partnership among UN agencies, NGOs as well as the media and other partners/donors in implementing cost-effective but technically sound and sustainable malaria control adapted to the country's conditions and responding to local needs.

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# **ANNEXES**

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Annex 3: Monitoring and evaluation project indicators

# III. HISTORICAL CONTEXT

The new Director General of WHO committed herself to an intensive response to the global malaria burden and proposed the *Roll Back Malaria Initiative (RBM)* in January 1998. A global coalition to Roll Back Malaria, characterized by strategic synergy, co-ordinated effort, and science-based strategies, was proposed at the World Health Assembly in 1998. The Global Partnership to RBM, consisting of WHO, UNICEF, UNDP, World Bank and a group of National Government representatives, heads of bilateral donor organizations, representatives of the private sector, and non-governmental bodies was formally established in December 1998. Members of the Global RBM Partnership are committed to supporting country-level efforts that are led by national authorities within the context of their multisectoral strategies for development and poverty alleviation.

A meeting to establish a partnership for Roll Back Malaria in the Central Asian Republics was held in Tashkent, Uzbekistan in July 1999. Commitment to build up a Regional RBM Partnership was the main outcome of the meeting. The RBM Country Project proposal was drawn up by the Ministry of Health in close collaboration with WHO, Regional Office for Europe, and submitted to potential donors and partners in 2000. The Project will support the country in partnership building and working together in the promotion of health sector actions that reduce the incidence of malaria and prevent a resumption of malaria transmission in other areas of the country.

The malaria problem may become a major obstacle to development in Kazakhstan, where at present more than 4.5 million people, or 30 per cent of the total population, live in areas where conditions for the transmission of malaria are favourable. During 1996-2000, 350 cases of malaria were reported in the country (see Annex 1). In recent years the number of autochthonous cases of malaria has continued to rise, and there is a trend towards an increase in malaria incidence in the country. The reestablishment of malaria transmission and occurrence of local malaria cases have been a result of the deterioration of the malaria situation in neigbouring countries in Central Asia, massive population movements, and a lack of appropriate malaria control. The malaria situation was aggravated by the importation of malaria from countries of Central Asia.

The malaria control programme in Kazakhstan is funded by the Government and WHO. However, at present, resources invested in malaria control by the Government and WHO are limited, and the country is in need of additional external assistance to cope with the malaria problem.

# IV. CURRENT MALARIA SITUATION

The last autochthonous case of malaria was reported in 1967, and in 1968, the only cases of malaria to be reported in Kazakhstan were imported cases. Throughout the 1980s, about 40–80 imported cases were reported annually in the country. The first case due to local transmission occurred in 1992, and sporadic cases have occurred since in the southern and north—western parts of the country. In recent years the number of autochthonous cases has continued to rise (7 in 2000), and there is a trend towards an increase in malaria incidence in the country.

# V. HOST COUNTRY STRATEGY

# III.A. NATIONAL STRATEGY

Kazakhstan has committed itself to malaria control, and in 2000, the national health authorities, in collaboration with the WHO Regional Office for Europe, developed the National Malaria Prevention and Control Programme which is being implemented. The four elements of the Programme are as follows:

**Disease Prevention:** to plan and implement sustainable preventive measures;

**Disease Management:** to provide early diagnosis and prompt treatment;

**Epidemic Control:** to detect early outbreaks and prevent the further spread of malaria

epidemics;

**Programme Management:** to strengthen institutional capacities of the National Malaria Control

Programme and surveillance mechanisms

### III.B. INSTITUTIONAL FRAMEWORK FOR MALARIA CONTROL

The National Parasitological Service (NPS) is responsible for technical guidance, planning, monitoring and evaluation of malaria control in the country. NPS staff is comprised of epidemiologists, parasitologists, entomologists, laboratory technicians and administrative staff, with some of these positions vacant, particularly at peripheral levels. At the regional (oblast) level, the head of the regional centre of sanitary and epidemiological services is responsible for the implementation of malaria control activities in the respective area. The team includes epidemiologists, parasitologists, entomologists and laboratory personnel. At the district (rayon) level, the head of the district centre of sanitary and epidemiological services has overall responsibility for all malaria-related activities in the respective area. At regional and district levels, disease management activities related to malaria are carried out by specialized and general health services equipped with microscopic facilities, most of which are in need of upgrading.

Currently, malaria control interventions consist mainly of selective vector control, disease management, training and surveillance.

# III.C. PRIOR AND ONGOING ASSISTANCE

In recent years **WHO** assistance has focused on strengthening the National Malaria Prevention and Control Programme through technical assistance and consultations, international/local training, entomological studies, providing antimalarial drugs, laboratory equipment/supplies and office equipment/supplies.

# IV. PROJECT JUSTIFICATION

In face of the re–establishment of malaria transmission in Border areas with Uzbekistan and a real threat of resumption of malaria transmission in different areas of the country, project attempts to change this unfavourable trend, particularly in outbreak–prone border areas with Uzbekistan, where autochthonous cases of *Plasmodium vivax* malaria are reported. The practical technical and operational modalities on dealing with malaria by specialized services and the public health sector as well as the community itself are the expected outcomes of the RBM Project, funded by a number of international agencies/organizations and implemented by the Government of Kazakhstan. The project will have a strong but flexible management structure capable of mobilizing the partnership among the Ministry of Health, UN agencies and other donor agencies and countries, NGOs and the media in implementing cost-effective but technically sound and sustainable malaria control adapted to the country's conditions and responding to local needs.

### IV.A. PROBLEMS TO BE ADDRESSED

# Problem I:

Autochthonous cases of malaria are observed in areas bordering Uzbekistan. The availability of efficient malaria vectors and failures to maintain previously effective vector control has resulted in a sudden increase in vectorial capacity and the re–establishment of malaria transmission. Population movements within the country, as well as cross–border migration, including that of infected persons, is one of the possible reasons for outbreaks among vulnerable, non-immune people and the re–introduction of malaria into areas which were previously free from the disease.

### **Problem II:**

Shortages of insecticides and limited use of antilarval operations result in limited impact of vector control operations.

# **Problem III:**

Existing health facilitities are under-equipped and under-supplied, which leads to inadequate quality of disease management and prevention. Although laboratory facilities are available at central, regional and district levels, most of them are in need of upgrading.

### **Problem IV:**

There is a lack of malaria surveillance, particularly at the periphery.

### Problem V:

Communities' lack of knowledge and skills in prevent themselves from malaria results in scant use of personal protective measures.

### **Problem VI:**

Limited resources invested by the Government and WHO result in a lack of proper funding to cope with the malaria problem and its spread throughout the territory of the country.

# IV.B. TARGET LOCATIONS AND INTENDED BENEFICIARIES

During 2002-2005, assistance is to be provided for eight selected districts (rayons) in Almatinskya, South Kazakhskaya and Dzhambul'skay oblasts where risk of malaria outbreaks and re-establishment of malaria transmission is highest (see Annex 2). In general, the target beneficiaries will be nearly 700 000 indigenous people and migrants entering the country for various reasons.

# IV.C. SUCCESS IMPACT INDICATORS

A base-line survey conducted in project areas will provide an assessment of the malaria-related problems and needs at the beginning of the project, whereas a terminal evaluation at the end of project will bring to light improvements in the malaria situation occurring as a result of project interventions.

In the short and medium term, the project is likely to reduce the incidence of malaria and prevent a resumption of malaria transmission in areas areas where it had been eradicated in the past. Sustaining the project activities beyond 2005 could reduce the impact of malaria to a sufficiently low level so that it no longer represent a public health problem.

# V. PROJECT STRATEGY AND PRIORITY INTERVENTIONS

The above will be addressed by actions in specific priority areas, all of which are in line with the following strategic components of the Project and incorporated into the four elements of the National Action Plan for Malaria Control and Prevention:

# Component I:

STRENGTHENING INSTITUTIONAL CAPACITIES OF THE NATIONAL MALARIA CONTROL PROGRAMME AND GENERAL HEALTH SERVICES AND ENHANCING CAPACITY FOR DECISION-MAKING RELATED TO MALARIA AND ITS CONTROL/PREVENTION

To be effective, the national plan of action for malaria prevention and control should be implemented through properly organized and managed specialized and general health services. To facilitate the execution of the RBM project in Kazakhstan, some important aspects in the implementation and management of malaria prevention and control programme, notably responsibility, authority and accountability for work done, resources used and outputs/outcomes produced at all levels should be reviewed. To provide technical and operational guidance in a satisfactory manner, health staff of specialized health services should be trained in programme management. Technical assistance and back—up will be provided by WHO personnel.

# Component II: BUILDING UP RBM PARTNERSHIP

RBM will address malaria as a priority health issue within the context of sustainable health sector development in Kazakhstan. WHO will provide strategic direction, coordination and technical/financial support for malaria control interventions under RBM. Other partners involved in the RBM Project will mobilize additional funds for RBM interventions.

# Component III: IMPROVING CAPACITIES FOR & ACCESS TO EARLY DIAGNOSIS AND ADEQUATE TREATMENT OF MALARIA

An established and properly functioning system for the identification of cases, reliable and early diagnosis, effective and prompt treatment, and follow-up of treatment results comprise fundamental parts of the project. Since microscopic examination remains the most reliable and least expensive way to diagnose malaria, diagnostic laboratory facilities will be upgraded within project areas.

# Component IV: IMPROVING CAPACITIES FOR TIMELY RESPONSE TO AND PREVENTION OF MALARIA EPIDEMICS

All epidemic-prone areas and situations will be identified and forecasted. Emergency preparedness for and mechanisms of response to malaria epidemics will be improved. Contingency plans for epidemic control including indoor spraying will be worked out and the reserve of drugs, insecticides and spraying equipment will be maintained for rapid deployment. Basic Health Staff will be trained to recognize epidemic situations and build up community preparedness.

# Component V: CAPACITY BUILDING

Training is a key component of the project. In–service training in disease management and prevention will be conducted for all categories of specialized programme and public health personnel within project areas. Laboratory personnel will be trained in malaria microscopy. Basic training will be supplemented by regular supervision and refresher training courses. The training will be practical in nature and directed towards developing skills and competence.

# Component VI: REINFORCING RBM COUNTRY SURVEILLANCE MECHANISM

A base-line survey to assess problems and needs related to malaria will be carried out at the beginning of the project. Mechanisms for the regular collection, processing and analysis of operational, epidemiological and socio-economic data relevant to planning/re-planning, implementation, monitoring and evaluation of the project activities will be built in. The existing reporting and information system will be improved. The survey data will provide a systematic way to determine whether the project approaches and interventions and other inputs are appropriate and sufficient to achieve the stated targets and objectives.

# Component VII: INCREASING COMMUNITY AWARENESS PARTICIPATION IN MALARIA CONTROL/PREVENTION

The involvement of communities and their partnership with the formal and informal health sectors to empower them in their own health development is crucial. People should be educated in malaria and its control/prevention and have access to adequate health care facilities. Existing treatment practices will be improved through the development and dissemination of clear messages on malaria and its treatment. Community and family care and preventive practices will be strengthened through the provision of IEC materials, capacity building, traditional/mass media and community support. KAP assessments will be conducted on ways to promote compatibility of practices, customs and beliefs of various social groups and minorities with existing malaria control/prevention options, and to develop effective IEC strategies and targeted IEC materials.

# Component VIII: STRENGTHENING RESEARCH CAPABILITIES

Operational research is essential for the planning, implementation and evaluation of the project activities, and this will comprise an integral part of the project. Such research will address not only the planning and effectiveness of specific interventions, but also cultural, behavioural, social and economic factors that might affect project interventions and outcomes.

# Component IX: ENHANCING INTERSECTORAL COLLABORATION

Additional resources for malaria control remain severely constrained. The social, economic and environmental problems posed by malaria exceed the jurisdiction and capabilities of the Ministry of Health. There is obviously a need for improved intersectoral collaboration, as well as for planning and information sharing, to see that additional funds are earmarked for malaria control. Such collaboration is best developed from a shared understanding of the underlying problems to be addressed. Information on development activities and the migration of organized and non-organized population groups will be collected and exchanged amongst all parties concerned. The Ministry of Health will stimulate the non-health sectors for active collaboration in malaria control, including the mobilization of additional funds. National multi–sectoral committees will promote coordination and collaboration in malaria control among all concerned.

# VI. PROJECT OBJECTIVES, ACTIVITIES AND OUTPUTS

# VI.A. DEVELOPMENT OBJECTIVE

The development objective is to prevent malaria outbreaks, reduce the incidence of malaria and prevent its further spread across the country, and minimize socio—economic losses provoked by the disease through the progressive strengthening of capacities and capabilities of health services and mobilizing community actions within the context of the Roll Back Malaria initiative in Kazakhstan.

# VI.B. SPECIFIC OBJECTIVES, ACTIVITIES AND OPERATIONAL OUTPUTS

Specific Objective I:	STRENGTHENED NATIONAL MALAI				
	GENERAL HEALTH SERVICES AS WELL AS ENHANCED CAPACITY FOR DECISION-MAKING RELATED TO				
	MALARIA AND ITS				
ACTIVITIES	OPERATIONAL	TIMEFRAME	POSSIBLE	ESTIMATED	
To render technical and managerial expertise and back-up for the RBM Project	WHO short-term consultants recruited and expert advice given wherever required	2002-2005	WHO	USD 40 000	
2. To train Regional/District Health Directors and Directors of Sanitary and Epidemiological Services in programme manage- ment to improve capacities for planning and implementation of the project activities	Regional/District Health Directors and Directors of Sanitary and Epidemiological Services involved in the project trained	2002-2005	MoH/NPS WHO UN Agencies NGOs Others	USD 20 000	
3. To train selected Regional/District Medical Officers in existing approaches to disease management, epidemic control and community mobilization	Regional/District MOs in project areas trained	2002-2005	MoH/NPS WHO UN agencies NGOs Others	USD 40 000	
4. To support international training selected NPS personnel in malaria and its control as well as entomology	Selected NPS personnel trained abroad	2002-2005	WHO MoH/NPS Others	USD 40 000	
				TOTAL: USD 140 000	

Specific Objective II:	BUILT UP RBM A	ADVOCACY A	ND PARTNERSHI	P
ACTIVITIES	OPERATIONAL	TIMEFRAME	POSSIBLE	ESTIMATED
	OUTPUTS		PARTNERS	COST
To identify partners and conduct RBM advocacy through workshops and meetings; message development to obtain broad, inter-sectoral commitment at different levels in the country	Partners identified  Targeted RBM advocacy activities conducted among various partners at all levels	2002-2005	WHO UN agencies MoH/NPS NGOs Informal Sector Media Others	USD 10 000
				TOTAL: USD 10 000

Sp	ecific Objective III:	IMPROVED CAPACITIES FOR AND ACCEES TO EARLY DIAGNOSIS AND RADICAL TREATMENT OF MALARIA			
AC	TIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
1.	To select and train/retrain laboratory staff in malaria microscopy	Laboratory staff trained/retrained	2002-2005	MoH/NPS WHO UN agencies NGOs Others	USD 30 000
2.	To upgrade laboratory facilities in selected health centres	Health facilities upgraded	2002-2005	MoH/NPS WHO NGOs	To be borne by MoH
3.	To set up supervision and quality control systems of laboratory services and ensure its functionality	Systems set up and functioning	2002–2005	MoH/NPS WHO NGOs Others	USD 20 000
4.	To set up care quality assessments system and ensure its functionality	System set up and functioning	2002–2005	MoH/NPS WHO NGOs Others	USD 20 000
5.	To develop/modify/produce training/learning materials on disease management and prevention	Materials developed and produced	2002-2005	MoH/NPS WHO UN agencies NGOs Others	USD 30 000
6.	To train health personnel in case management	Health personnel trained	2002–2005	MoH/NPS UN agencies WHO NGOs Others	USD 30 000
7.	To procure and distribute laboratory equipment/supplies and drugs/other items required for disease management	Equipment and supplies procured and distributed	2002-2005	UN agencies WHO NGOs Others	USD 100 000
					TOTAL: USD 230 000

Speci	fic Objective IV:	IMPROVED CAPACITIES FOR TIMELY RESPONSE TO AND PREVENTION OF MALARIA OUTBREAKS			
ACTIV	ITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
1.	To develop monitoring mechanisms for the detection/forecasting of epidemic risk factors	Monitoring mechanisms developed	2002-2003	WHO MoH/NPS	To be covered by WHO Consultant
2.	To update NPS operational guidelines and procedures related to the detection and control of epidemics	Operational guidelines and procedures updated	2002-2003	MoH/NPS WHO	To be borne by MoH
3.	To improve emergency preparedness for and response to malaria epidemics in project areas where outbreaks are a recurring problem	Emergency preparedness for and response to malaria outbreaks improved	2002–2005	MoH/NPS	To be borne by MoH
4.	To procure and deliver insecticides and equipment for spraying	Insecticides and equipment for spraying procured and distributed	2002–2005	WHO UN agencies Others	USD 200 000
5.	To apply indoor residual spraying in case of emergency	Residual spraying applied	2002-2005	MoH/NPS	To be borne by MoH
6.	To train health personnel in epidemic control	Health personnel trained	2002–2005	MoH/NPS UN agencies WHO NGOs Others	USD 30 000
					TOTAL: USD 230 000

STRENGTHENED RBM COUNTRY SURVEILLANCE MECHANISMS			
OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
Base–line survey and impact surveys carried out	2002-2005	MoH/NPS WHO	USD 10 000
Operational and epidemiological indicators identified	2002	MoH/NPS WHO	To be covered by WHO Consultant
Personnel of SESs/NPSs	2002–2005	MoH/NPS	USD 20 000
lamou		UN agencies NGOs Others	
Operational and epidemiological database established and maintained	2002–2005	MoH/NPS NGOs	To be borne by MoH
Reporting and information systems improved	2002–2005	MoH/NPS WHO	To be borne by MoH
Transportation, equipment and supplies procured	2002–2005	WHO UN agencies Others	USD 25 000
Monitoring undertaken	2002-2005	MoH/NPS WHO NGOs	USD 20 000
			TOTAL: USD 75 000
	OPERATIONAL OUTPUTS  Base-line survey and impact surveys carried out  Operational and epidemiological indicators identified  Personnel of SESs/NPSs trained  Operational and epidemiological database established and maintained  Reporting and information systems improved  Transportation, equipment and supplies procured	OPERATIONAL OUTPUTS  Base—line survey and impact surveys carried out  Operational and epidemiological indicators identified  Personnel of SESs/NPSs trained  Operational and epidemiological database established and maintained  Reporting and information systems improved  Transportation, equipment and supplies procured  TimeFRAME  2002-2005	OPERATIONAL OUTPUTS         TIMEFRAME PARTNERS           Base-line survey and impact surveys carried out         2002-2005         MoH/NPS WHO           Operational and epidemiological indicators identified         2002         MoH/NPS WHO           Personnel of SESs/NPSs trained         2002-2005         MoH/NPS WHO UN agencies NGOs Others           Operational and epidemiological database established and maintained         2002-2005         MoH/NPS NGOs           Reporting and information systems improved         2002-2005         MoH/NPS WHO           Transportation, equipment and supplies procured         2002-2005         WHO UN agencies Others           Monitoring undertaken         2002-2005         MoH/NPS WHO

Specific Objective VI:	INCREASED COMMUNITY AWARENESS AND PARTICIPATION IN MALARIA CONTROL AND PREVENTION			
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
1. To strengthen community and family care and prevention practices through providing IEC materials, awareness raising sessions, community support, skills building and mass media	Malaria care and prevention practices strengthened	2002–2005	MoH/NPS UN agencies WHO NGOs Community Others	USD 60 000
2. The rapid assessments on practices of recognition and treatment of malaria and personal protection will be conducted in order to develop effective IEC strategy	KAP designed and conducted	2002	MoH/NPS UN agencies WHO NGOs Community Others	USD 5 000
3. To build IEC service capacity, including development of targeted IEC materials and IEC management and monitoring	Targeted IEC materials developed; IEC campaign implemented and monitored	2002-2005	MoH/NPS UN agencies WHO NGOs Media Others	USD 60 000
				TOTAL: USD 125 000

Specific Objective VII:	STRENGTHENED CAPABILITIES FOR OPERATIONAL RESEARCH			
ACTIVITIES	OPERATIONAL	TIMEFRAME	POSSIBLE	ESTIMATED
	OUTPUTS		PARTNERS	COST
To design research protocols, carry out studies and prepare final reports	Protocols designed, studies conducted and final reports prepared	2002	MoH/NMCP WHO ECHO NGOs Research Institutions Others	USD 30 000
				USD 30 000

Sp	ecific Objective VIII:	ENHANCED INTE	RSECTORAL (	COLLABORA	TION
AC	TIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
1.	To set up a National Multi– Sectoral Committee and ensure its functionality	National Multi–Sectoral Committee established and functioning	2002-2005	MoH/NMCP GOs WHO	To be borne by the Government
2.	To define situations where collaboration is needed and establish mechanisms to promote collaboration within the project areas	Situations defined and mechanisms established	2002–2005	MoH/NMCP GOs	To be borne by the Government
3.	To coordinate the exchange of information about all development activities relevant to malaria within the project areas	An effective system of communication on malaria between health and non-health sectors established and exchange of information coordinated	2002–2005	MoH/NMCP GOs	To be borne by the Government
4.	To identify and mobilize additional resources required for malaria control from non-health sectors	Additional resources identified and mobilized	2002-2005	MoH/NMCP GOs	To be borne by the Government

# VII. PROJECT MANAGEMENT AND TIMEFRAME

The project will be implemented by the Ministry of Health, National Parasitological Service with technical and financial support from WHO and other potential donors and partners. The project management structure is as outlined below.

At the central level: The National Parasitological Service will be responsible for the implementation of project activities. The Director of NPS/Project Manager will work in close consultation with the Ministry of Health. Personnel of NPS will undertake field visits to supervise the performance of work carried out in the field. WHO consultants will be recruited to assist in the planning and evaluation of project activities. Implementation of some project activities, such as upgrading laboratory facilities, training, health education, community–based activities and other interventions would be sub–contracted to international NGOs.

At the regional/district levels: Focal points for the project (Chiefs of Regional/District Sanitary and Epidemiological Services/Parasitological Services) will be designated for better communication and coordination between the central and district levels. Staff of Regional/District parasitological and public health service will be responsible for all project—related activities in their respective areas. Technical advice will be provided by regional/district specialized health personnel dealing with malaria issues.

WHO will provide overall technical backstopping and strategic coordination of project activities with UN agencies/NGOs and others concerned. The project will be implemented in full consultation with all agencies and organizations involved in order to enhance coordination and maximize the impact of assistance. The project is planned for a period of four years (2002-2005).

# VIII. PROJECT MONITORING AND EVALUATION

Monitoring and evaluation will be a critical and continuous process of reviewing the progress of the project and its problems and constraints, with the sole purpose of identifying the required areas of action for enhanced effectiveness of the project. Comprehensive monitoring and evaluation will be carried out by the National Implementing Agency, in collaboration with WHO/EURO, at regular intervals. An impact assessment survey will be carried out at the conclusion of the project. Monitoring and evaluation will be based on the participation of all stakeholders.

WHO/EURO will provide technical clearance of the Project Document before the start of the project. Project management will prepare a project implementation plan during the first month of the start the project. The project will be subject to annual reviews and reporting. The project's final draft will be prepared in advance to allow review and technical clearance by WHO. Project management will be responsible for the preparation and submission of the project evaluation reports. Specific monitoring and evaluation methods, schedules and indicators will be developed for the project at the start of the project (see *Annex 3*)

# IX. RISKS

The RBM Project in Kazakhstan is a new initiative. The implementation of the RBM strategy could entail some risk. The implementation and management of the Project should be reviewed periodically to ensure that the Project remains on track.

A continuous flow of inputs from different UN agencies and other donors is critical to the success of the RBM Project in Kazakhstan. There is some risk that the funding agencies would not be able to provide and/or sustain the level of inputs required to see a visible project impact. An insufficiency of funds will limit the scope of the project activities.

# X. PROJECT BUDGET

The total project budget, estimated at *USD 912 000*, would be contributed by the Government, WHO and other partners/donors (see table 1 below). The Government would cover operational costs of the existing NPS/public health staff to be involved in the implementation of project activities.

Table 1 The estimated project budget for 2002-2005

DECODIDEION	2002	2003	2004	2005
DESCRIPTION	USD	USD	USD	USD
Technical Expertise: International Experts Duty Travel	10 000 15 000	10 000 15 000	10 000 15 000	10 000 15 000
Sub-Total:	25 000	25 000	25 000	25 000
Equipment - Expendable: Drugs & Laboratory supplies Insecticides/equipment for indoor spraying	10 000 50 000	10 000 50 000	10 000 50 000	10 000 50 000
Equipment - Non-Expendable: Laboratory Equipment Transportation Office Equipment/Supplies	15 000 5 000 5 000	15 000 5 000 -	15 000 5 000 5 000	15 000 - -
Sub-Total:	85 000	80 000	85 000	75 000
Quality Assessments/Assurance: Care Quality Assessments Supervision and quality control of laboratory service	5 000 5 000	5 000 5 000	5 000 5 000	5 000 5 000
Problems And Needs Assessments	5 000			
KAP Study/ IEC Service Capacity Building	20 000	15 000	15 000	15 000
RBM Advocacy & Partnership Building	2 500	2 500	2 500	2 500
Impact Assessment				5 000
Training: In-service training: Development & production of training materials	20 000	10 000	-	-
Central and intermediate level training Peripheral level training for public health	15 000	15 000	15 000	15 000
personnel International Training:	30 000	30 000	25 000	25 000
Training in malaria and its control	10 000	10 000	10 000	10 000
Operational Research	10 000	10 000	10 000	-
Community Capacity Building	15 000	15 000	15 000	15 000
Monitoring/Evaluation	5 000	5 000	5 000	5 000
Miscellaneous: Operation & Maintenance Sundries	2 000 1 000	2 000 1 000	2 000 1 000	2 000 1 000
TOTAL:	255 500	230 500	220 500	205 500

# **ANNEXES**

# Annex 1: The Malaria situation in Kazakhstan 1995–2000

	1995	1996	1997	1998	1999	2000
Autochthonous malaria	0	1	0	4	1	7
Imported cases	41	87	84	84	52	30
Plasmodium vivax	37	-	-	76	48	37
Plasmodium falciparum	4	-	-	3	1	0
Mixed infections	0	-	-	9	4	0
Total number of malaria cases	41	88	84	88	53	37

# Annex 2: RBM project areas in Kazakhstan 2002-2005

- Panfilovskij, Karatal'skij and Y'gurskij Districts, Almatinskya Oblast
- Makhtaaral'skij, Sariagashskij and Shardarinskji Districts, South-Kazakhskay Oblast
- Kurda'skji and Merkenskji Districts, Dzhambul'skay Oblast

The project's targeted beneficiaries will be nearly 700 000 indigenous people and migrants.

# **Annex 3: Monitoring and evaluation indicators**

<u>U</u>	utput (process) indicators:
	Percentage of project districts with adequate amount of learning and IEC materials
	Percentage of project districts with adequately trained health staff
	Percentage of project districts with adequate provision of equipment, drugs, insecticides and other supplies
	Percentage of project districts under regular supervision of malaria diagnosis and treatment/laboratory services
	Percentage of project districts/population under surveillance
<u>O</u>	utcome indicators:
	Percentage of project districts where epidemic control operations with emphasis on indoor residual spraying have been correctly applied and all active foci are covered by the above–mentioned interventions
	Percentage of project districts where more than 75 % of patients are being diagnosed/treated correctly
	Percentage of project districts where more than 75 % of care providers use updated knowledge and built–up skills in diagnosis and treatment/management of malaria
	Percentage of project districts where more than 75 % of households, families and mothers are award of symptoms/diagnosis/treatment/referral and are capable of providing appropriate self–diagnosis
<u>In</u>	npact indicators (to estimate the effect of large-scale interventions within project areas):
	As a result of improved coverage and quality of epidemic control measures:  A decrease in the incidence of P. vivax malaria  Prevention of malaria outbreaks  Prevention of re-establishment of transmission of P. vivax malaria
	As a result of improved coverage and quality of diagnosis and radical treatment of P. vivax:  Prevention of relapses of P. vivax malaria

# **ROLL BACK MALARIA**

# PROJECT DOCUMENT

# MINISTRY OF HEALTH REPUBLIC OF KYRGYZSTAN

# WORLD HEALTH ORGANIZATION REGIONAL OFFICE FOR EUROPE

Title: The Roll Back Malaria Project

Duration: 4 years, January 2002 – December 2005

Project Sites: Selected districts and cities (15) in Oshskaya, Batkenskaya and

Chu'skaya Oblasts

Intended Beneficiaries: About 1 800 000 indigenous people and migrants

Requesting Agency: WHO

Govt. Cooperating Agency: Ministry of Health, Kyrgyzstan

Estimated Starting Date: January 2002

Estimated Project Budget: 2002: USD 285 500

2003: USD 255 500 2004: USD 250 500 2005: USD 235 500

**TOTAL** (2002-2005): **USD 1 027 000** 

### **BRIEF DESCRIPTION**

Malaria was eradicated many years ago in Kyrgyzstan. Malaria cases once again started to appear in the country from 1995, owing to massive cross-border population movements. The majority of malaria cases were imported from Tajikistan. During 1995–2000, 70 cases of malaria were reported in the country, of which 13 were autochthonous. In 2001, the number of cases of malaria reported has continued to rise, particularly in areas bordering Tajikistan and Uzbekistan. The malaria situation in these border areas remains serious, and its deterioration can be expected in the future. The country has been sub-divided into zones with high, moderate and low malaria potential, and although only a tiny part of the country is considered a high–risk zone, this is a is densely populated area. The southern districts of Osh and Jalalabad regions are included in this zone. The National Malaria Prevention and Control Programme is at present implemented and supported by WHO, and activities consist of disease management, training and surveillance. However, the limited resources invested by the Government and WHO result in a lack of funding sufficient to cope with the malaria problems in the country.

The RBM Project will support the country in building country partnerships and working together to promote health-related actions that reduce the incidence of malaria and prevent the resumption of malaria transmission in other areas of the country. In Kyrgyzstan, the RBM Project will focus on addressing malaria—related issues through capacity building, improving capacities for and access to early diagnosis/adequate treatment and timely response to and prevention of malaria outbreaks, reinforcing surveillance mechanisms, and increasing community awareness and involvement in malaria prevention. Implementation of the RBM Project will be a collaborative effort of the Ministry of Health in cooperation with WHO and other potential partners and donors. The project is planned for a period of four years (2002-2005). The project will have a strong but flexible management structure capable of mobilizing the partnership among UN agencies and NGOs as well as the media and other partners/donors in implementing cost-effective but technically sound and sustainable malaria control adapted to the country's conditions and responding to local needs.

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# **ANNEXES**

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#### VI. HISTORICAL CONTEXT

The new Director General of WHO committed herself to an intensive response to the global malaria burden and proposed the *Roll Back Malaria Initiative (RBM)* in January 1998. A global coalition to Roll Back Malaria, characterized by strategic synergy, co-ordinated effort, and science-based strategies, was proposed at the World Health Assembly in 1998. The Global Partnership to RBM; consisting of WHO, UNICEF, UNDP, World Bank and a group of National Government representatives, heads of bilateral donor organizations, representatives of the private sector, and non-governmental bodies, was formally established in December 1998. Members of the Global RBM Partnership are committed to supporting country-level efforts that are led by national authorities within the context of their multisectoral strategies for development and poverty alleviation.

A meeting to establish a partnership for Roll Back Malaria in the Central Asian Republics was held in Tashkent, Uzbekistan in July 1999. Commitment to build up a Regional RBM Partnership was the main outcome of the meeting. The RBM country project proposal was drawn up by the Ministry of Health with technical assistance from WHO/EURO and submitted to potential donors in 2000. The RBM Project supports the country in partnership building and working together in the promotion of health sector actions that reduce the incidence of malaria and prevent the resumption of malaria transmission in other areas of the country.

The malaria problem may become a major obstacle to development in Kyrgyzstan, where at present more than 50 per cent of the total population lives in areas where conditions for the transmission of malaria are favourable. In 1996, 26 cases of malaria were reported (see *Annex 1*). During 1998–2001, the number of autochthonous cases of malaria continued to rise, and there is a trend towards an increase in the incidence of malaria in the country. The re-establishment of malaria transmission and occurrence of local malaria cases have been a result of the deterioration of the malaria situation in neighbouring countries of Central Asia, massive cross—border population movements, and a lack of appropriate malaria control. The malaria situation has been aggravated by a steady increase in the number of imported malaria into the country during the past years.

The Malaria Control Programme in Kyrgyzstan is funded by the Government and WHO. However, at present, resources invested for malaria control by the Government and WHO are limited, and the country is in need of additional external assistance to cope with the malaria problem.

#### VII. CURRENT MALARIA SITUATION

Malaria was eradicated many years ago in Kyrgyzstan. Malaria cases once again started to appear in the country from 1995, owing to massive cross–border population movements. The majority of malaria cases were imported from Tajikistan.

During 1995–2000, 70 cases of malaria were reported in the country, of which 13 were autochthonous. The country was subdivided into zones with high, moderate and low malaria potential, and only a tiny part of the country, an area which is highly populated, is considered a high-risk malaria area. This includes the southern districts of Osh and Jalalabad regions, where the malaria transmission season may last up to six months, depending on weather conditions. In 2001, the number of autochthonous cases has continued to rise, and there is a trend towards an increase in the incidence of malaria in the country, particularly in border areas with Tajikistan and Uzbekistan.

### III. HOST COUNTRY STRATEGY

#### III.A. NATIONAL STRATEGY

Kyrgyzstan has committed itself to malaria control, and in 2000, the national health authorities, in collaboration with EURO/WHO, developed the National Malaria Prevention and Control Programme which is being implemented. The four elements of the Programme are as follows:

**Disease Prevention:** to plan and implement sustainable preventive measures

**Disease Management:** to provide early diagnosis and prompt treatment

**Epidemic Control:** to detect early outbreaks and prevent the further spread of malaria

epidemics

**Programme Management:** to strengthen institutional capacities of the National Malaria Control

Programme and surveillance mechanisms

#### III.B. INSTITUTIONAL FRAMEWORK FOR MALARIA CONTROL

The National Parasitological Service (NPS), as part of the National Sanitary and Epidemiological Service, is responsible for technical guidance, planning, monitoring and evaluation of malaria control in the country. NPS staff is comprised of epidemiologists, parasitologists, entomologists, laboratory technicians and administrative staff, with some positions vacant, particularly at peripheral levels. At the regional (oblast) level, the head of the regional centre of sanitary and epidemiological services is responsible for implementing malaria control activities in the respective area. The team includes epidemiologists, parasitologists, entomologists and laboratory personnel. At the district (rayon) level, the head of the district centre of sanitary and epidemiological services has overall responsibility for all malaria-related activities in the area. At regional and district levels, disease management activities related to malaria are carried out by specialized and general health services equipped with microscopic facilities, most of which are in need of upgrading.

Currently, malaria control interventions consist mainly of disease management, training, surveillance, procurement and distribution of supplies/equipment.

#### III.C. PRIOR AND ONGOING ASSISTANCE

In recent years, **WHO** assistance has focused on strengthening the National Malaria Prevention and Control Programme through technical assistance and consultation, international/local trainings, entomological studies, provision of antimalarial drugs, laboratory/spraying equipment and supplies, supporting country IEC campaigns and strengthening malaria surveillance, particularly in border areas with Tajikistan and Uzbekistan.

### IV. PROJECT JUSTIFICATION

In face of the re–establishment of malaria transmission in border areas with Tajikistan and Uzbekistan and a real threat of the resumption of malaria transmission in other areas of the country, the project attempts to change this unfavourable trend, particularly in epidemic–prone border areas with Tajikistan and Uzbekistan, where autochthonous cases of *Plasmodium vivax* malaria have been reported. The practical, technical and operational modalities on dealing with malaria by specialized services and the public health sector as well as the community itself are the expected outcomes of the RBM Project, funded by a number of international agencies/organizations and implemented by the Government of Kyrgyzstan. The project will have a strong but flexible management structure, capable of mobilizing partnerships amongst the Ministry of Health, UN agencies and other donor agencies and countries, NGOs, and the media in implementing cost-effective but technically sound and sustainable malaria control measures adapted to the country's conditions and responding to local needs.

#### IV.A. PROBLEMS TO BE ADDRESSED

#### Problem I:

Autochthonous cases of malaria, particularly in areas bordering Tajikistan and Uzbekistan,have been reported. The availability of efficient malaria vectors and failure to maintain previously effective vector control has resulted in the sudden increase in vectorial capacity and the re–establishment of malaria transmission. Population movements within the country, as well as cross–border migration, including that of infected persons, is one possible reason for outbreaks amongst vulnerable, non-immune people and for the re–introduction of malaria into areas which were previously free from the disease.

### **Problem II:**

Shortages of insecticides and limited use of antilarval operations result in a limited impact of the vector control operations.

# **Problem III:**

Health facilities are under-equipped and under-supplied, which leads to inadequate quality of disease management and prevention. Laboratory facilities are available at central, regional and district levels, but most of them need to be upgraded.

## **Problem IV:**

There is a lack of malaria surveillance, particularly at the periphery.

#### **Problem V:**

Communities lack the knowledge and skills to prevent themselves from malaria, which results in scant use of personal protective measures.

#### **Problem VI:**

The limited resources invested by the Government and WHO result in lack of proper funding to cope with the malaria problem and its spread throughout the territory of the country.

# IV.B. TARGET LOCATIONS AND INTENDED BENEFICIARIES

During 2002-2005, assistance should be provided for the 15 selected districts (rayons) in Oshskaya, Batkenskaya and Chu'skaya oblasts (see Annex 2). In general, the target beneficiaries will be more than 1 800 000 indigenous people and migrants entering there for various reasons.

## IV.C. SUCCESS IMPACT INDICATORS

A base-line survey conducted in project areas will provide an assessment of the malaria-related problems and needs at the beginning of the project, whereas a terminal evaluation conducted at the end of the project will bring to light improvements in the malaria situation which have occurred as a result of project interventions.

In the short and medium term, the project is likely to reduce the incidence of malaria and prevent a resumption of malaria transmission in areas where it had been eradicated in the past. Sustaining project activities beyond 2005 could reduduce the impact of malaria to a sufficiently low level so that it no longer represent a public health problem.

#### VIII. PROJECT STRATEGY AND PRIORITY INTERVENTIONS

The above will be addressed by actions in specific priority areas, all of which are in line with the following strategic components of the Project and incorporated into the four elements of the National Action Plan for Malaria Control and Prevention:

<u>Component I:</u> STRENGTHENING INSTITUTIONAL CAPACITIES OF THE NATIONAL

MALARIA CONTROL PROGRAMME/GENERAL HEALTH SERVICES AND ENHANCING CAPACITY FOR DECISION-MAKING RELATED TO MALARIA AND ITS CONTROL/PREVENTION

To be effective, the national plan of action for malaria prevention and control should be implemented through properly organized and managed specialized and general health services. To facilitate the execution of the RBM project in Kyrgyzstan, some important aspects in the implementation and management of malaria prevention and control programme, notably responsibility, authority and accountability for work done, resources used and outputs/outcomes produced at all levels, should be reviewed. To provide adequate technical and operational guidance in a satisfactory manner, health staff of specialized health services should be trained in programme management. Technical assistance and back—up will be provided by WHO personnel.

### Component II: BUILDING UP RBM PARTNERSHIPS

RBM will address malaria as a priority health issue within the context of sustainable health sector development in Kyrgyzstan. WHO will provide strategic direction, coordination and technical/financial support for malaria control interventions under RBM. Other partners involved in the RBM Project will mobilize additional funds for RBM interventions.

# Component III: IMPROVING CAPACITIES FOR AND ACCESS TO EARLY DIAGNOSIS AND ADEQUATE TREATMENT OF MALARIA

An established and properly functioning system for the identification of cases, reliable and early diagnosis, effective and prompt treatment, and follow-up of treatment results are all fundamental parts of the project. Since the microscopic examination remains the most reliable and least expensive way to diagnose malaria, diagnostic laboratory facilities will be upgraded within project areas.

# Component IV: IMPROVING CAPACITIES FOR TIMELY RESPONSE TO AND PREVENTION OF MALARIA EPIDEMICS

All epidemic-prone areas will be identified and potential situations forecasted. Emergency preparedness for and mechanisms of response to malaria epidemics will be improved. Contingency plans for epidemic control, including indoor spraying, will be worked out, and a reserve of drugs, insecticides and spraying equipment will be maintained for rapid deployment. Basic Health Staff will be trained to recognize epidemic situations and build up community preparedness.

#### Component V: CAPACITY BUILDING

Training is a key component of the project. In–service training in disease management and prevention will be conducted for all categories of specialized programme and public health personnel within project areas. Laboratory personnel will be trained in malaria microscopy. Basic training will be supplemented by regular supervision and refresher training courses. Training will be practical in nature and directed towards developing skills and competence.

## Component VI: REINFORCING RBM COUNTRY SURVEILLANCE MECHANISMS

A base–line survey to assess problems and needs related to malaria will be carried out at the beginning of the project. Mechanisms for regular collection, processing and analysis of operational, epidemiological and socio-economic data relevant to planning/re-planning, implementation, monitoring and evaluation of the project activities will be built in. The existing reporting and information system will be improved. Survey data will provide a systematic way to determine whether the project approaches and interventions and other inputs are appropriate and sufficient to achieve the stated targets and objectives.

# Component VII: INCREASING COMMUNITY AWARENESS AND PARTICIPATION IN MALARIA CONTROL/PREVENTION

The involvement of communities and their partnership with the formal and informal health sectors to empower them in their own health development is crucial. People should be educated about malaria and its control/prevention and have access to adequate health care facilities. Existing treatment practices will be improved through the development and dissemination of clear messages on malaria and its treatment. Community and family care and preventive practices will be strengthened through the provision of IEC materials, capacity building, traditional/mass media and community support. KAP assessments will be conducted on ways to promote compatibility of practices, customs and beliefs of various social groups and minorities with existing malaria control/prevention options, and to develop effective IEC strategies and targeted IEC materials.

### Component VIII: STRENGTHENING RESEARCH CAPABILITIES

Operational research is essential for the planning, implementation and evaluation of the project activities, and this will comprise an integral part of the project. Such research will address not only the planning and effectiveness of specific interventions, but also cultural, behavioural, social and economic factors that might affect project interventions and outcomes.

## Component IX: ENHANCING INTERSECTORAL COLLABORATION

Additional resources for malaria control remain severely constrained. The social, economic and environmental problems posed by malaria exceed the jurisdiction and capabilities of the Ministry of Health. There is obviously a need for improved intersectoral collaboration, as well as for planning and information sharing, to see that additional funds are earmarked for malaria control. Such collaboration is best developed from a shared understanding of the underlying problems to be addressed. Information on development activities and the migration of organized and non-organized population groups will be collected and exchanged amongst all parties concerned. The Ministry of Health will stimulate the non-health sectors for active collaboration in malaria control, including the mobilization of additional funds. National multi–sectoral committees will promote coordination and collaboration in malaria control among all concerned.

## IX. PROJECT OBJECTIVES, ACTIVITIES AND OUTPUTS

### VI.A. DEVELOPMENT OBJECTIVE

The development objective is to prevent malaria outbreaks, reduce the incidence of malaria and prevent its further spread across the country, and minimize socio-economic losses provoked by the disease through the progressive strengthening of the capacities and capabilities of health services and mobilizing community actions within the context of the Roll Back Malaria initiative in Kyrgyzstan.

# VI.B. SPECIFIC OBJECTIVES, ACTIVITIES AND OPERATIONAL OUTPUTS

	ecific Objective I:	STRENGTHENED INSTITUTIONAL CAPACITIES OF THE NATIONAL MALARIA CONTROL PROGRAMME, GENERAL HEALTH SERVICES AND ENHANCED CAPACITY FOR DECISION-MAKING RELATED TO MALARIA AND ITS CONTROL AND PREVENTION  OPERATIONAL TIMEFRAME POSSIBLE ESTIMATED				
AC	TIVITIES	OUTPUTS	TIVILITRAIVIL	PARTNERS	COST	
4.	To render technical and managerial expertise and back-up for the RBM Project	WHO short-term consultants recruited and expert advice given wherever required	2002-2005	WHO	USD 40 000	
5.	To train Regional/District Health Directors and Directors of Sanitary and Epidemiological Services in programme management to improve capacities for planning and implementation of project activities	Regional/District Health Directors and Directors of Sanitary and Epidemiological Services involved in the project trained	2002-2005	MoH/NPS WHO UN Agencies NGOs Others	USD 20 000	
6.	To train selected Regional/District Medical Officers in existing approaches to disease management, epidemic control and community mobilization	Regional/District MOs in project areas trained	2002-2005	MoH/NPS WHO UN agencies NGOs Others	USD 40 000	
6.	To support through international training selected NPS personnel in malaria and its control as well as entomology	Selected NPS personnel trained abroad	2002-2005	WHO MoH/NPS Others	USD 40 000	
					TOTAL: USD 140 000	

Sp	ecific Objective II:	BUILT UP RBM ADVOCACY AND PARTNERSHIP			
AC	TIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
2.	To identify partners and conduct RBM advocacy through workshops and meetings and message development to obtain broad, inter-sectoral commitment at different levels in the country	Partners identified  Targeted RBM advocacy activities conducted among various partners at all levels	2002-2005	WHO UN agencies MoH/NPS NGOs Informal Sector Media Others	USD 10 000
					TOTAL: USD 10 000

Specific Objective III:	IMPROVED CAPACI DIAGNOSIS AND RA			
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
To select and train/retrain laboratory staff in malaria microscopy	Laboratory staff trained/re- trained	2002-2005	MoH/NPS WHO UN agencies NGOs Others	USD 30 000
To upgrade laboratory facilities in selected health centres	Health facilities upgraded	2002-2005	MoH/NPS WHO NGOs	To be borne by MoH
10. To set up supervision and quality control systems of laboratory services and ensure their functionality	Systems set up and functioning	2002–2005	MoH/NPS WHO NGOs Others	USD 20 000
To set up system for the assessment of quality of care and ensure its functionality	System set up and functioning	2002–2005	MoH/NPS WHO NGOs Others	USD 20 000
12. To develop/modify/produce training/learning materials on disease management and prevention	Materials developed and produced	2002-2005	MoH/NPS WHO UN agencies NGOs Others	USD 30 000
13. To train basic health staff in case management	BHS trained	2002–2005	MoH/NPS WHO UN agencies NGOs Others	USD 30 000
14. To procure and distribute laboratory equipment/supplies and drugs/other items required for disease management	Equipment and supplies procured and distributed	2002-2005	WHO UN agencies NGOs Others	USD 100 000
				TOTAL: USD 230 000

Specific Objective IV:	IMPROVED CAPACI AND PREVENTION			
ACTIVITIES	OPERATIONAL	TIMEFRAME	POSSIBLE	ESTIMATED
ACTIVITIES	OUTPUTS	THILLIKAME	PARTNERS	COST
7. To develop monitoring mechanism for detection/forecasting epidemic risk factors	Monitoring mechanism developed	2002-2003	WHO MoH/NPS	To be covered by WHO Consultant
8. To update NPS operational guidelines and procedures related to detection and control of epidemics	Operational guidelines and procedures updated	2002-2003	MoH/NPS WHO	To be borne by MoH
9. To improve emergency preparedness for and response to malaria epidemics in project areas where outbreaks are a recurring problem	Emergency preparedness for and response to malaria outbreaks improved	2002–2005	MoH/NPS WHO	To be borne by MoH
10. To procure and deliver insecticides and equipment for spraying	Insecticides and equipment for spraying procured and distributed	2002–2005	WHO UN Agencies Others	USD 280 000
11. To apply indoor residual spraying in cases of emergency	Residual spraying applied	2002-2005	MoH/NPS	To be borne by MoH
12. To train health personnel in epidemic control	Health personnel trained	2002–2005	MoH/NPS WHO UN agencies NGOs Others	USD 30 000
				TOTAL: USD 310 000

Sp	ecific Objective V:	STRENGTHENED R MECHANISMS	BM COUNTI	RY SURVEILI	LANCE
AC	TIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
8.	To design and carry out a base– line survey to assess needs and problems related to malaria and impact assessment survey	Base–line survey and impact surveys carried out	2002-2005	MoH/NPS WHO	USD 10 000
9.	To identify operational and epidemiological indicators needed for monitoring/evaluation of project activities	Operational and epidemiological indicators identified	2002	MoH/NPS WHO	To be covered by WHO Consultant
10.	To train personnel of SESs in data collection, processing and analysis	Personnel of SESs trained	2002–2005	MoH/NPS WHO UN agencies NGOs Others	USD 20 000
11.	To establish and maintain the project operational and epidemiological database	Operational and epidemiological database established and maintained	2002-2005	MoH/NPS WHO	To be borne by MoH
12.	To improve the existing reporting and information systems	Reporting and information systems improved	2002–2005	MoH/NPS WHO	To be borne by MoH
13.	To procure project transportation, equipment and supplies to improve supervision and monitoring of project activities at all levels	Transportation, equipment and supplies procured	2002–2005	WHO UN Agencies Others	USD 20 000
14.	To undertake monitoring of project activities	Monitoring undertaken	2002-2005	MoH/NPS WHO NGOs	USD 20 000
					TOTAL: USD 70 000

Specific Objective VII:						
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST		
4. To strengthen community and family care and prevention practices through provision of IEC materials, awareness raising sessions, community support, skills building and mass media	Malaria care and prevention practices strengthened	2002–2005	MoH/NPS UN agencies WHO NGOs Community Others	USD 80 000		
5. To conduct rapid assessments on practices of recognition and treatment of malaria and personal protection in order to develop effective IEC strategy	KAP designed and conducted	2002	MoH/NPS UN agencies WHO NGOs Community	USD 5 000		
To build IEC service capacity including development of targeted IEC materials and IEC management and monitoring	Targeted IEC materials developed; IEC campaign implemented and monitored	2002-2005	MoH/NPS UN agencies WHO NGOs Media Others	USD 80 000		
				TOTAL: USD 165 000		

Specific Objective VII:	STRENGTHENED CAPABILITIES FOR OPERATIONAL RESEARCH				
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST	
To design research protocols, carry out studies and prepare final reports	Protocols designed, studies conducted and final reports prepared	2002	MoH/NMCP WHO ECHO NGOs Research Institutions Others	USD 30 000  TOTAL: USD 30 000	

Sp	ecific Objective VIII:	ENHANCED INTE	RSECTORAL (	COLLABORA	TION
AC	TIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
5.	To set up a National Multi– Sectoral Committee and ensure its functionality	National Multi–Sectoral Committee established and functioning	2002-2005	MoH/NMCP GOs WHO	To be borne by the Government
6.	To define situations where collaboration is needed and establish mechanisms to promote collaboration within project areas	Situations defined and mechanisms established	2002–2005	MoH/NMCP GOs	To be borne by the Government
7.	To coordinate the exchange of information about all development activities relevant to malaria within the project areas	An effective system of communication on malaria between health and non-health sectors established and exchange of information coordinated	2002–2005	MoH/NMCP GOs	To be borne by the Government
8.	To identify and mobilize additional resources required for malaria control from non-health sectors	Additional resources identified and mobilized	2002-2005	MoH/NMCP GOs	To be borne by the Government

## X. PROJECT MANAGEMENT AND TIMEFRAME

The project will be implemented by the Ministry of Health, National Parasitological Service with technical and financial support from WHO and other potential donors and partners. The project management structure is as outlined below.

At the central level: The National Parasitological Service will be responsible for the implementation of project activities. The Director of the National Epidemiological Supervision Department/Project Manager will work in close consultation with the Ministry of Health. NPS staff will undertake field visits to supervise the performance of work done in the field. WHO consultants will be recruited to assist in the planning and evaluation of project activities. Implementation of some project activities, such as upgrading laboratory facilities, training, health education, community—based activities and other interventions, will be sub—contracted to international NGOs.

At the regional/district levels: Focal points for the project (Chiefs of Regional/District Sanitary and Epidemiological Service/Parasitological Service) will be designated for better communication and coordination between the central and district levels. Staff of regional/district parasitological and general health services will be responsible for all project–related activities in their respective areas. Technical advice will be provided by regional/district specialized health personnel dealing with malaria issues.

WHO will provide overall technical backstopping and strategic coordination of project activities with UN agencies/NGOs and others concerned. The project will be implemented in full consultation with all agencies and organizations involved in order to enhance coordination and maximize the impact of assistance. The project is planned for a period of four years (2002-2005).

#### VIII. PROJECT MONITORING AND EVALUATION

Monitoring and evaluation will be a critical and continuous process of reviewing the progress of the project and its problems and constraints, with the sole purpose of identifying the required areas of action to enhance its effectiveness. Comprehensive monitoring and evaluation will be carried out by the National Implementing Agency, in collaboration with WHO/EURO, at regular intervals. An impact assessment survey will be carried out at the end of the project. Monitoring and evaluation will be based on participation of all the stakeholders.

The WHO Regional Office for Europe will provide technical clearance of the Project Document before the start of the project. Project management will prepare a project implementation plan during the first month of the start the project. The project will be subject to annual reviews and reporting. The project's final draft will be prepared in advance to allow review and technical clearance by WHO. Project management will be responsible for the preparation and submission of the project evaluation reports. Specific monitoring and evaluation methods, schedules and indicators will be developed for the project at the start of the project (see annex 3)

#### IX. RISKS

The RBM Project in Kyrgyzstan is a new initiative. The implementation of the RBM strategy could entail some risk. The implementation and management of the Project should be reviewed periodically to ensure that the project remains on track.

A continuous flow of inputs from different UN agencies and other donors is critical to the success of the RBM Project in Kyrgyzstan. There is some risk that funding agencies may not be able to provide and/or sustain the level of inputs required to see a visible project impact. An insufficient amount of funding would limit the scope of the project activities.

# X. PROJECT BUDGET

The total project budget, estimated at <u>USD 1 027 000</u>, would be contributed by the Government, WHO and other partners/donors (see Table below). The Government will cover the operational costs of involving the existing NPS/public health staff in the implementation of project activities.

Table: Estimated Project Budget for 2002-2005

10 000 15 000 25 000	10 000 15 000 25 000	10 000 15 000 25 000	10 000 15 000
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# **ANNEXES**

# Annex 1: The Malaria situation in Kyrgyzstan, 1995–2000

	1995	1996	1997	1998	1999	2000
Autochthonous malaria	0	1	0	5	0	7
Imported cases	3	25	13	6	5	5
Plasmodium vivax	3	22	-	11	-	12
Plasmodium falciparum	0	0	-	0	-	0
Mixed infections	0	4	-	0	-	0
Total number of malaria cases	3	26	13	11	5	12

# Annex 2: RBM project areas in Kyrgyzstan, 2002-2005

- Uzgenskij, Kara-Su'skij, Chon-Ala'skij Districts and c.Osh in Oshskaya Oblast
- Lia'liakskij, Kadamzha'skij, Batkenskij District and c. Sulyukta and c. Kizil-Kij in Batkenskaya Oblast
- Panfilovskij, Zha'ilskij, Moskovskij, Sokulukskij, Alamudunskij, Issik-Atinskij Districts in Chu'skaya Oblast

The project target beneficiaries will be more than 1 800 000 indigenous people and migrants.

# Annex 3: Monitoring and evaluation indicators

<u>Ou</u>	tput (process) indicators:
	Percentage of project districts with adequate learning and IEC materials
	Percentage of project districts with adequately trained health staff
	Percentage of project districts with adequate provision of equipment, drugs, insecticides and other supplies
	Percentage of project districts under regular supervision of malaria diagnosis and treatment/laboratory services
	Percentage of project districts/population under surveillance
<u>Ou</u>	tcome indicators:
	Percentage of project districts where epidemic control operations with emphasis on indoor residual spraying have been correctly applied and all active foci are covered by the above–mentioned interventions
	Percentage of project districts where more than 75 % of patients are being diagnosed/treated correctly
	Percentage of project districts where more than 75 % of care providers use updated knowledge and built–up skills in diagnosis and treatment/management of malaria
	Percentage of project districts where more than 75 % of households, families and mothers are aware of symptoms/diagnosis/treatment/referral and are capable of providing appropriate self–diagnosis
<u>lm</u>	pact indicators (to estimate the effect of large-scale interventions within project areas):
	As a result of improved coverage and quality of epidemic control measures:  A decrease in the incidence of P. vivax malaria Prevention of malaria outbreaks Prevention of re-establishment of transmission of P. vivax malaria
	As a result of improved coverage and quality of diagnosis and radical treatment of P. vivax:

# **ROLL BACK MALARIA**

# PROJECT DOCUMENT

# MINISTRY OF HEALTH REPUBLIC OF TAJIKISTAN

# WORLD HEALTH ORGANIZATION REGIONAL OFFICE FOR EUROPE

Title: The Roll Back Malaria Project

Duration: January 2002 – December 2005

Project Sites: Selected districts (42) in the Khatlon and Leninabad Regions,

Districts of Republican Sub-Ordination and G.B.A.O.

Intended Beneficiaries: About 4 500 000 indigenous people and migrants

**WHO** 

Requesting Agency:

Other Collaborative Organizations

(at present):

ECHO, USAID, MERLIN, ACTED, WFP, UNICEF

Govt. Cooperating Agency: Ministry of Health, National Malaria Control Programme, Tajikistan

Estimated Start Date: January 2002

Estimated Project Budget: 2002: USD 920 000

2003: USD 895 000 2004: USD 845 000 2005: USD 815 000

TOTAL (2002-2005): USD 3 475 000

#### **BRIEF DESCRIPTION**

Malaria began to assume epidemic proportions in Tajikistan in the mid-90s. In the year 2000, almost 20 000 malaria cases were reported. The situation is complicated by the spread of *P. falciparum*, with a rise in the number of reported cases from 187 to 831 from 1998–2000. A sharp increase in the reported incidence of *P. vivax* malaria in the northern, western and central parts of the country is another aggravating feature of the malaria situation in Tajikistan. The magnitude of malaria in the country is much greater than that which figures would suggest, and cannot be reliably assessed on the basis of data available. The National Malaria Control Programme, the major component of the National Programme of Tropical Disease Control, was developed in 1997 and is at present implemented and supported by WHO, USAID, ECHO, WFP, UNICEF, MERLIN and ACTED. Activities consist of vector control, disease management, training, health education and surveillance. However, the limited resources invested by the government and external donors result in a lack of funding to cope with the malaria problem in the country.

The RBM Project will support Tajikistan in building partnerships, encouraging partners to agree upon goals, synchronize their strategies and work together in the promotion of health-related actions which will reduce suffering from malaria and the burden of the disease in the country. The project will focus on addressing malaria—related issues through capacity building, improving capacities for and access to early diagnosis and adequate treatment, promoting cost-effective and sustainable vector control, reinforcing surveillance mechanisms, strengthening research capabilities, increasing community awareness and involvement in malaria prevention/control, and enhancing intersectoral collaboration. Implementation of the RBM Project will be a collaborative effort of the Ministry of Health in cooperation with WHO, USAID, ECHO, UNICEF, ACTED, MERLIN, WFP, and other partners/donors. The project is planned for a period of 4 years (2002-2005). The project will have a strong but flexible management structure capable of mobilizing the partnerships amongst the UN agencies and NGOs as well as the media and other partners/donors in implementing cost-effective but technically sound and sustainable malaria control measures adapted to the country's conditions and responding to local needs.

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# **ANNEXES**

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#### VIII. HISTORICAL CONTEXT

The Director General of WHO committed herself to an intensive response to the global malaria burden and proposed the *Roll Back Malaria Initiative (RBM)* in January 1998. A global coalition to Roll Back Malaria, characterized by strategic synergy, co-ordinated effort, and science-based strategies, was proposed at the World Health Assembly in 1998. The Global Partnership to RBM, comprised of leading representatives of WHO, UNICEF, UNDP, World Bank and a group of national government representatives, heads of bilateral donor organizations, and representatives of the private sector and non-governmental bodies, was formally established in December 1998. Members of the Global RBM Partnership are committed to supporting country-level efforts that are led by national authorities within the context of their multi-sectoral strategies for development and poverty alleviation.

A meeting to establish a partnership for Roll Back Malaria in the Central Asian Republics was held in Tashkent, Uzbekistan in July 1999. Commitment to build up a Regional RBM Partnership was the main outcome of the meeting. The RBM Inception Meeting took place in Tajikistan in January 2000. The RBM country strategy was developed and the RBM country project proposal was drawn up in 2001. The Project aims to support the country in partnership building, helping partners to agree upon goals, synchronize their strategies and work together in the promotion of health sector actions which will reduce suffering from malaria and the disease burden.

The malaria burden has become a major obstacle to development in Tajikistan, where at present more than two thirds of the total population of the country is living at risk of malaria. There were almost 30 000 malaria cases in 1997, representing the highest rate of malaria morbidity to be reported in the country over the past 50 years (see Annexes 1 and 2). Over the last couple years, owing to intensive malaria control interventions, the reported incidence of malaria has dropped by nearly 30 per cent. Despite a slight reduction in the reported incidence of malaria cases in 1997–2001, the magnitude of malaria in the country is much greater and cannot be reliably assessed on the basis of data available.

The massive malaria epidemic and progressive return of endemicity has been a result of the complete interruption of malaria control interventions as a consequence of civil war and disruption of the capacity of both government and community to implement appropriate malaria control measures. The malaria situation was aggravated by the importation and resumption of transmission of *Plasmodium falciparum*. Population movements represent a real threat towards the spreading and re–introduction of malaria to other territories where it had been eradicated in the past. Children and pregnant women are threatened by malaria, which is one of the biggest impediments to child growth and development in the country.

The malaria control programme in Tajikistan is at present funded by WHO, ECHO, WFP, UNICEF, MERLIN and ACTED. However, at present resources invested for malaria control by the government and external donors are limited and the country is in need of additional external assistance to cope with the malaria problem.

#### IX. THE CURRENT MALARIA SITUATION

At the end of the 1960s it was declared that malaria had been nearly eradicated in Tajikistan. However, the residual foci of malaria remained in the southern part of the country bordering Afghanistan, where transmission of *Plasmodium vivax* malaria persisted and sporadic cases of *Plasmodium vivax* were reported every year. In the year 1990, 175 cases of *Plasmodium vivax* were reported in the country.

As a result of civil war and socio-economic disturbances in Tajikistan, the malaria situation deteriorated in 1992, and by the middle of the 1990's, it had assumed epidemic proportions. In the year 2000, a total of 19 064 malaria cases were reported in the country, 60 per cent of which occurred in the Khatlon Region (see *Annexes 1 and 2*). The situation was also complicated by the occurrence and spread of *Plasmodium falciparum* malaria, the most potentially lethal form of the disease. During

1998–2000, the reported number of *Plasmodium falciparum* cases rose from 187 to 831. A sharp increase in the reported incidence of *Plasmodium vivax* malaria in the northern, western and central parts of the country is another aggravating feature of the malaria situation in Tajikistan.

The recent malariometric surveys, conducted by a WHO/RBM field team in project areas of the Khatlon Region, have shown that more than 10 per cent of the study population are asymptomatic parasite carriers of *P. vivax* and *P. falciparum* malaria, and these cases have never been seen in public health facilities. The burden of malaria in the Khatlon Region (the most affected area in the WHO European Region), with a total population of nearly 2.2 million people, may be estimated at 150 000 to 250 000 malaria patients. The total country estimate of malaria cases (asymptomatic and asymptomatic) may approach 300 000 to 400 000.

#### III. HOST COUNTRY STRATEGY

#### III.A. NATIONAL STRATEGY

Tajikistan has committed itself to malaria control as an integral part of the National Programme of Tropical Diseases Control. In 1997, the national health authorities, in collaboration with WHO Regional Office for Europe, developed the National Malaria Control Programme which is presently being implemented. The four elements of the Programme are as follows:

**Disease Prevention:** to plan and implement sustainable preventive measures

**Disease Management:** to provide early diagnosis and prompt treatment

**Epidemic Control:** to detect early outbreaks and prevent further spread of malaria

epidemics

Programme Management: to strengthen institutional capacities and surveillance mechanisms of

the National Malaria Control Programme.

### III.B. INSTITUTIONAL FRAMEWORK FOR MALARIA CONTROL

The National Malaria Control Programme, as a major component of the National Tropical Disease Centre, is responsible for technical guidance, planning, monitoring and the evaluation of malaria control in the country. The head of the National Malaria Control Programme is the Director of the National Tropical Disease Centre. NMCP staff is comprised of parasitologists, entomologists, laboratory technicians and administrative staff, although many of these positions are at present vacant, particularly at peripheral levels. At the regional (oblast) level, the heads of regional centres of tropical disease control, as the leaders of malaria control teams, are responsible for the supervision of malaria control activities in the respective divisions. The teams include parasitologists, entomologists and laboratory technicians. At the district (rayon) level, the heads of district centres of tropical disease control have overall responsibility for all malaria-related activities in their districts. At the district level, disease management activities related to malaria are carried out by general health services through Peripheral Health Posts (PHPs), Rural Medical Centes (RMCs), Rural Station Hospitals (RSHs) and District Hospitals (DHs). Diagnosis and treatment of malaria are considered a part of the primary health care system. PHPs are staffed by a health assistant and a midwife, while Medical Officers are attached to RMCs and RSHs. There are, in principle, no laboratory facilities at the RMCs and RSHs. RSHs are responsible for a number of RMCs, which, in turn, take care of PHPs which are also not provided with microscopic facilities.

Currently, malaria control interventions consist mainly of vector control, disease management, training, surveillance, health education, and the procurement and distribution of supplies/equipment.

### III.C. PRIOR AND ONGOING ASSISTANCE

WHO assistance focuses on strengthening the National Malaria Control Programme through technical assistance and consultations, international/local training, support of malaria surveillance and biological

control, entomological studies and provision of insecticides, antimalarial drugs, laboratory equipment/supplies and means of transportation. **ECHO** provides insecticides and equipment for indoor residual spraying. **USAID** and **MERLIN** have been providing valuable assistance in improving capacities for disease management, in particular training laboratory technicians in malaria microscopy, the supply of antimalarial drugs, and the provision of laboratory equipment and quality control. **ACTED** is actively involved in promoting community—based approaches to malaria prevention. In 2000 **UNICEF** provided assistance through health education programmes, capacity building and provision of laboratory equipment. **WFP** supplies food to personnel involved in the implementation of malaria control activities. In 1997–1998, the Government of Japan provided emergency assistance for malaria control, with the provision of drugs, equipment and supplies for the microscopic diagnosis of malaria, indoor residual spraying and stationery for training activities. In the year 2000, the Government of Italy assisted in the procurement of means of transportation for staff involved in malaria control.

#### IV. PROJECT JUSTIFICATION

In face of the grave malaria situation in Tajikistan, attempts will be undertaken to change the unfavourable malaria trend witnessed in the country. Within the framework of this project, particular emphasis will be given to border areas with Afghanistan, where the incidence and prevalence of *Plasmodium vivax* and *Plasmodium falciparum* malaria remains high. The practical technical and operational modalities on dealing with malaria by specialized services of the public health sector, as well as the community itself, are amongst the expected outcomes of the RBM Project, funded by a number of international agencies/organizations and implemented by the Government of Tajikistan. The project will have a strong but flexible management structure, capable of mobilizing the partnerships between the Ministry of Health, UN agencies and other donor agencies and countries, international NGO's, and the media in implementing cost-effective but technically sound and sustainable malaria control measures adapted to the country's conditions and responding to local needs.

#### IV.A. PROBLEMS TO BE ADDRESSED

## **Problem I:**

The progressive return of endemicity into areas along the Afghan–Tajikistan border, and the further spread of epidemic malaria to other areas of the country has been observed over the past few years. The situation is complicated by the occurrence and spread of *Plasmodium falciparum* malaria.

#### **Problem II:**

Shortages of insecticides and limited use of antilarval operations result in limited impact of the vector control operations.

### **Problem III:**

Under-equipped, under-supplied and under-staffed existing health facilities and under-paid public health personnel lead to the inadequate quality of disease management and prevention.

#### **Problem IV:**

Poor capacities for early diagnosis and prompt treatment of malaria result in inadequate coverage of people at risk of malaria. Most malaria patients are never seen in public health sectors and are self-treated, and these cases are not reported to NMCP. An additional factor to be considered is the fact that malaria patients are usually treated on an out–patient basis, and many of them do not complete the full course of anti–relapse treatment.

#### **Problem V:**

A lack of surveillance, including inadequate malaria reporting and poor coordination among the existing partners involved in malaria control, particularly at the district level, results in a distorted reflection of the extent of the malaria problem in the country.

#### **Problem VI:**

Communities' lack of knowledge and skills to prevent themselves from malaria results in scant use of personal protective measures. The majority of the population still carries numerous misconceptions about malaria, and are not aware of the preventive measures which can be taken. Knowledge and perception of malaria and its prevention usually arises from personal experience or hearsay. The majority of people who reside in endemic areas accept malaria as an unavoidable and chronic condition. They associate malaria with their lifestyles and environments which favour the onset of the disease.

#### **Problem VII:**

Limited resources invested by the government and external donors result in a lack of proper funding to cope with the malaria problem.

#### IV.B. TARGET LOCATIONS AND INTENDED BENEFICIARIES

From 2002-2005, assistance will be provided to 42 selected districts in the Khatlon, Leninabad and Gorno–Badakhshan Autonomous Regions, as well as selected districts under Direct Republican Subordination (see *Annex 3*). The majority of project areas are situated in the plain areas and foothills with poorly developed health infrastructures and communication. Generally speaking, the target beneficiaries will be represented by 4.5 million indigenous people and migrants entering these areas for various reasons. Owing to their vulnerable status, young children and pregnant women will be the focus of particular attention.

#### IV.C. SUCCESS IMPACT INDICATORS

A base-line survey conducted in project areas will provide an assessment of the malaria-related problems and needs at the beginning of the project, whereas a terminal evaluation at the conclusion of the project will bring to light improvements in the malaria situation which have occurred as a result of interventions.

In the short and medium term, the project is likely to reduce the incidence and prevalence of *Plasmodium vivax* and *Plasmodium falciparum* malaria, and to prevent deaths due to malaria and its further spread to areas where malaria had been eradicated in the past. Sustaining the project activities beyond 2005 could contribute to a further decrease in the incidence and prevalence of malarial diseases, and interruption of the transmission of *Plasmodium falciparum* in the country.

#### XI. PROJECT STRATEGY AND PRIORITY INTERVENTIONS

The above will be addressed by actions in specific priority areas, all of which are in line with the following strategic components of the Project and incorporated into the four elements of the National Malaria Control Strategy:

# <u>Component I:</u> STRENGTHENING INSTITUTIONAL CAPACITIES OF THE NATIONAL

MALARIA CONTROL PROGRAMME/GENERAL HEALTH SERVICES AND ENHANCING CAPACITIES FOR DECISION-MAKING RELATED TO MALARIA AND ITS CONTROL AND PREVENTION

To be effective, the national plan of action for malaria control should be implemented through a properly organized and managed National Malaria Control Programme and general health services. To facilitate the execution of the RBM project in Tajikistan, some important aspects in the implementation and management of malaria control programme, notably responsibility, authority and accountability for work done, resources used and outputs/outcomes produced at all levels, should be reviewed. To provide adequate technical and operational guidance in a satisfactory manner, staff of Tropical Disease Control Centres and public health personnel should be trained in programme management. Technical assistance and back—up would be provided by the RBM unit of the WHO Regional Office for Europe. A National Malaria Technical Committee should be set up in order to enhance the country's capacities for decision—making on malaria and its control.

#### Component II: PROMOTING RBM COUNTRY PARTNERSHIP

RBM will address malaria as a priority health issue within the context of sustainable health sector development in Tajikistan. WHO will provide strategic direction, coordination and technical support for malaria control interventions under RBM. Other partners involved in the RBM Project will mobilize funds for RBM interventions, support community-based approaches for disease management and prevention, and provide insecticides/equipment for spraying, antimalarial drugs, laboratory equipment/supplies and diagnostic test kits.

# Component III: IMPROVING CAPACITIES FOR AND ACCESS TO EARLY DIAGNOSIS AND ADEQUATE TREATMENT OF MALARIA

An established and properly functioning system for the identification of cases, reliable and early diagnosis, effective and prompt treatment, and follow-up of treatment results comprise fundamental parts of the Project. Since the microscopic examination remains the most reliable and least expensive way to diagnose malaria, particularly its severe forms and treatment failures, diagnostic laboratory facilities will be established at the RMCs and RSHs within project areas. Criteria for the clinical diagnosis of malaria will be refined to assure a more efficient use of resources. Dip Stick-like technologies with algorithms for simple and labour-saving diagnosis of malaria will be introduced as a supplement to make the diagnosis of malaria adequate, even at the most peripheral levels. In order to prevent deaths from severe malaria, the management of severe and complicated malaria will be improved through appropriate referral, early detection and effective treatment before/after hospitalization. Information on drug response patterns will be continuously obtained through routine reporting and drug efficacy monitoring.

### Component IV: TARGETED SEASONAL MASS DRUG ADMINISTRATION

Seasonal chemoprophylaxis could be applied as mass drug administration in order to reduce the transmission of malaria in persistent foci by destroying/damaging sexual forms of the malaria parasites in the blood of infected persons. This could be achieved by applying gametocidal—oriented drugs (chloroquine – against *P. vivax* and primaquine – against *P. falciparum*). The timeline of its application would coincide with the period of mosquito effectiveness. Since numerous difficulties are inherent in the use of mass drug administration, this procedure, including method of distribution, timing and means of supervision, would be adopted only with very careful consideration.

# Component V: PROMOTING COST-EFFECTIVE AND SUSTAINABLE VECTOR CONTROL

To reduce transmission and the incidence of malarial disease, selective residual spraying will be applied in all the active foci of malaria within project areas, particularly where *An. superpictus* is responsible for malaria transmission. Antilarval measures, including distribution of gambusia fish, will be applied in some project areas. The use of personal protective measures, including impregnated mosquito nets, curtains and repellents will be encouraged through their social marketing and health education on a pilot basis. Appropriate approaches to communicate messages on malaria prevention directly to high-risk groups will be developed. All the above preventive measures will be guided by consideration of their technical and operational feasibility, effectiveness and sustainability.

# Component VI: IMPROVING CAPACITIES FOR TIMELY RESPONSE TO AND PREVENTION OF MALARIA EPIDEMICS

All epidemic-prone areas will be identified and potential situations forecasted within project areas. Emergency preparedness for and mechanisms of response to malaria epidemics will be improved. Contingency plans for epidemic control, including indoor spraying, will be worked out and a reserve of drugs, insecticides and spraying equipment will be maintained for rapid deployment. General health staff will be trained to recognize epidemic situations and build up community preparedness.

# Component VII: CAPACITY BUILDING

Training is a key component of the project. In–service training in disease management and prevention will be conducted for all categories of specialized programme and public health personnel within project areas. Particular emphasis will be given to appropriate training in diagnosis by using dipsticks and treatment of malaria by basic health staff. Laboratory personnel will be trained in malaria microscopy. Basic training will be supplemented by regular supervision and refresher training courses. Training will be practical in nature and directed towards developing skills and competence.

#### Component VIII: REINFORCING RBM COUNTRY SURVEILLANCE MECHANISMS

A base–line survey to assess problems and needs related to malaria will be carried out at the beginning of the project. Mechanisms for regular collection, processing and analysis of operational, epidemiological and socio-economic data relevant to planning/re-planning, implementation, monitoring and evaluation of project activities will be built in. The existing reporting and information system will be improved. The survey data will provide a systematic way to determine whether the project approaches and interventions, as well as other inputs, are appropriate and sufficient to achieve the stated targets and objectives.

# Component IX: STRENGTHENING RESEARCH CAPABILITIES

Operational research is essential for the planning, implementation and evaluation of the project activities, and this will comprise an integral part of the project. Such research will address not only the effectiveness of specific interventions, but also cultural, behavioural, social and economic factors that might affect project interventions and outcomes.

# Component X: INCREASING COMMUNITY AWARENESS AND PARTICIPATION IN MALARIA CONTROL/PREVENTION

The involvement of communities and their partnership with the formal and informal health sectors to empower them in their own health development is crucial. People should be educated about malaria and its control/prevention and have access to adequate health care facilities. Since self—medication and malaria treatment in the informal sector is the rule rather than the exception, the existing treatment practices will be improved through the development and dissemination of clear messages on malaria and its treatment. Community and family care and preventive practices will be strengthened

through the provision of IEC materials, skills building, and traditional/mass media and community support. KAP assessments will be conducted on ways to promote compatibility of practices, customs and beliefs of various social groups and minorities with existing malaria control/prevention options, and develop effective IEC strategies and targeted IEC materials.

## Component XI: ENHANCING INTERSECTORAL COLLABORATION

Additional resources for malaria control remain severely constrained. The social, economic and environmental problems posed by malaria exceed the jurisdiction and capabilities of the Ministry of Health. There is obviously a need for improved intersectoral collaboration, as well as for planning and information sharing, to ensure that additional funds are earmarked for malaria control. Such collaboration is best developed from a shared understanding of the underlying problems to be addressed. Information on development activities and the migration of organized and non-organized population groups will be collected and exchanged amongst all parties concerned. The Ministry of Health will stimulate the non-health sectors for active collaboration in malaria control, including mobilization of additional funds. National multi–sectoral committees will promote coordination and collaboration in malaria control among all concerned.

# XII. PROJECT OBJECTIVES, ACTIVITIES AND OUTPUTS

#### VI.A. DEVELOPMENT OBJECTIVES

The development objective is to prevent malaria mortality, reduce its morbidity and minimize socio-economic losses provoked by the disease through a progressive strengthening of the capacities and capabilities of health services and mobilizing community actions within the context of the Roll Back Malaria initiative in Tajikistan.

# VI.B. SPECIFIC OBJECTIVES, ACTIVITIES AND OPERATIONAL OUTPUTS

Sp	STRENGTHENED INSTITUTIONAL CAPACITIES OF THE NATIONAL MALARIA CONTROL PROGRAMME/ GENERAL HEALTH SERVICES AND ENHANCED CAPACITY FOR DECISION-MAKING RELATED TO MALARIA AND ITS CONTROL				
AC	TIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
7.	To render technical and managerial expertise and back-up for the RBM Project	WHO short-term consul- tants recruited and expert advice provided wherever required	2002-2005	WHO	USD 100 000
8.	To provide assistance for a WHO RBM field project office with international staff in the Khatlon Region	WHO RBM field office in Kurgan Tjube functional	2002-2005	WHO MoH/NMCP	USD 240 000
9.	To train Regional/District Health Directors and Directors of Centres of Tropical Disease Control in programme management to improve capacities for planning and implementation of project activities	Regional/District Health Directors and Directors of Centres of Tropical Disease Control involved in the project trained	2002-2005	MoH/NMCP WHO UN Agencies NGOs Others	USD 20 000
10.	To train selected Regional/District Medical Officers in existing approaches to disease management, epidemic control, and community mobilization	Regional/District MOs in project areas trained	2002-2005	MoH/NMCP WHO UN Agencies NGOs Others	USD 60 000
5.	To train entomologists from Centres of Tropical Disease Control	Entomologists trained	2002-2005	WHO MoH/NMCP	USD 20 000
6.	To support the inter- national training of selected NMCP personnel in malaria and its control, as well as entomology	Selected MPC personnel trained abroad	2002–2005	WHO MoH/NMCP	USD 40 000
7.	To set up a National Malaria Technical Committee and ensure its functionality	National Malaria Technical Committee established and functioning	2002-2005	MoH/NMCP WHO	To be borne by MoH  TOTAL: USD 480 000

Specific Objective II:	PROMOTING RBM COUNTRY PARTNERSHIP				
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST	
3. To maintain a country Information Network to facilitate communication and coordination of actions among all Partners involved in the RBM Project and ensure its functionality	Information Network established and functioning	2002–2005	WHO ECHO UN agencies MoH/NMCP NGOs Media Others	USD 10 000	
4. To identify potential partners and continue carrying out RBM advocacy through workshops and meetings, further development of the message to obtain broad, inter-sectoral commitment at different levels in the country	Partners identified and targeted RBM advocacy activities conducted among various partners at all levels	2002-2005	WHO UN agencies ECHO MoH/NMCP NGOs Informal Sector Media Others	USD 10 000	
				TOTAL: USD 20 000	

Sp	ecific Objective III:	IMPROVED CAPACI DIAGNOSIS AND AD MALARIA			
AC	TIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
1.	To select and train/retrain laboratory staff in malaria microscopy	Laboratory staff trained/re- trained	2002–2005	MoH/NMCP WHO UN Agencies NGOs Others	USD 40 000
2.	To set up/upgrade laboratory facilities in selected RMCs/RSHs/DHs and TDCs	Laboratory facilities set up and upgraded	2002–2005	MoH/NMCP WHO NGOs	To be borne by MoH
3.	To set up supervisory and quality control systems of laboratory services and ensure their functionality	Supervisory and quality control systems of laboratory services set up and functioning	2002–2005	MoH/NMCP WHO NGOs Others	USD 40 000
4.	To set up a system for the assessment of quality of care and ensure its functionality	Quality of care assessments system set up and functioning	2002–2005	MoH/NMCP WHO NGOs Others	USD 40 000
5.	To develop/modify/produce training/learning materials on disease management and prevention	Training/learning materials developed and produced	2002-2005	MoH/NMCP WHO UN Agencies Others	USD 50 000
6.	To train basic health staff in case management and the use of dipsticks	Health personnel trained in case management, including the use of dipsticks	2002–2005	MoH/NMCP WHO UN Agencies NGOs Others	USD 60 000
7.	To procure and distribute laboratory equipment/supplies, dipsticks and drugs/other items required for disease management	Supplies and equipment procured and delivered	2002–2005	WHO UN agencies NGOs Others	USD 300 000
					TOTAL: USD 530 000

Sp	ecific Objective IV:	TARGETED SEASONAL MASS DRUG ADMINISTRATION				
AC	TIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST	
1.	To define priority target areas and population groups by means of micro-stratification	Priority target areas and population groups defined	2002–2005	MoH/NMCP WHO	To be borne by MoH	
2.	To procure and deliver antimalarial drugs for chemoprophylaxis	Antimalarial drugs procured and delivered	2002–2005	UN agencies WHO NGOs Others	USD 200 000	
3.	To establish implementation mechanisms and ensure their functionality	Implementation mechanisms established and functioning	2002–2005	MoH/NMCP WHO NGOs	USD 40 000	
4.	To undertake monitoring and evaluation of chemo- prophylaxis campaign	Monitoring and evaluation of chemoprophylaxis undertaken	2002-2005	MoH/NMCP WHO NGOs	USD 20 000	
					TOTAL: USD 260 000	

Spe	Specific Objective V: PROMOTING COST-EFFECTIVE AND SUSTAINABLE VECTOR CONTROL				
ACT	IVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
To a	pply antilarval measures:				
1.	To define priority target areas by means of microstratification	Priority target areas defined within project areas	2002–2005	MoH/NMCP WHO	To be borne by MoH
2.	To procure and deliver equipment for gambusia fish rearing and distribution	Equipment for gambusia fish rearing and distribution procured and distributed	2002–2005	WHO ECHO NGOs Others	USD 40 000
3.	To establish implementation mechanisms and ensure their functionality	Implementation mechanisms established and functioning	2002–2005	MoH/NMCP WHO NGOs	USD 40 000
4.	To undertake monitoring and evaluation of antilarval measures	Antilarval activities monitored and evaluated	2002–2005	MoH/NMCP WHO NGOs	USD 15 000
redu	romote measures aimed at ction of human/vector contact a special emphasis on ITMNs:				
1.	To define priority target areas and population groups by means of microstratification	Priority target areas and population groups defined	2002-2005	MoH/NMCP WHO	To be borne by MoH
2.	To establish distribution system for ITMNs	Distribution system established	2002-2003	MoH/NMCP NGOs	To be borne by MoH/NGOs
3.	To procure and deliver mosquito nets and insecticides	Mosquito nets and insecticides procured and delivered	2002–2005	ECHO NGOs WHO Others	USD 400 000
4.	To establish and make functional communal re- impregnation services on cost-sharing basis and supervision of re- impregnation	Communal re— impregnation services and its supervision established and functioning	2002–2005	MoH/NMCP NGOs WHO	USD 100 000
5.	To undertake community– based monitoring and evaluation	Community–based monitoring and evaluation undertaken	2002-2005	MoH/NMCP NGOs WHO	USD 15 000
					TOTAL: USD 610 000

Specific Objective VI:	IMPROVED CAPACI AND PREVENTION			
ACTIVITIES	OPERATIONAL	TIMEFRAME	POSSIBLE	ESTIMATED
	OUTPUTS		PARTNERS	COST
15. To develop monitoring mechanisms for detection/forecasting epidemic risk factors	Monitoring mechanisms developed	2002-2003	WHO MoH/NMCP	To be covered by WHO Consultant
16. To update NMCP operational guidelines and procedures related to detection and control of epidemics	Operational guidelines and procedures updated	2002-2003	MoH/NMPC WHO	To be borne by MoH
17. To improve emergency preparedness for and response to malaria epidemics in project areas where outbreaks are a recurring problem	Emergency preparedness for and response to malaria outbreaks improved	2002–2005	MoH/NMCP WHO	To be borne by MoH
18. To apply indoor residual spraying in case of emergency	Indoor residual spraying applied	2002–2005	MoH/NMCP	USD 60 000
19. To procure insecticides for epidemic control as well as drugs and other items for disease management to be used in case of emergency	Supplies to be used in case of emergency procured	2002–2005	ECHO WHO Others	USD 1 160 000
20. To train BHS in epidemic control	BHS staff trained	2002–2005	MoH/NMCP ECHO WHO NGOs	USD 40 000
21. To undertake monitoring and evaluation	Monitoring and evaluation undertaken	2002-2005	MoH/NMCP ECHO WHO	USD 20 000
				TOTAL: USD 1 280 000

Specific Objective VII:	STRENGTHENED RBM COUNTRY SURVEILLANCE MECHANISMS				
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST	
15. To design and carry out a base– line survey to assess needs and problems related to malaria/impact survey	Base–line survey carried out	2002-2005	MoH/NMCP WHO	USD 10 000	
16. To identify operational and epidemiological indicators needed for monitoring/evaluation of project activities	Operational and epidemiological indicators identified	2002	MoH/NMCP WHO	To be covered by Consultant	
17. To train BHS/Personnel of SESs and TDCCs in data collection, processing and analysis	BHS and personnel of SESs/TDCCs trained	2002–2005	MoH/NMCP WHO UN Agencies NGOs Others	USD 40 000	
18. To establish and maintain the project's operational and epidemiological database	Operational and epidemiological database established and maintained	2002–2005	MoH/NMCP WHO	USD 10 000	
19. To improve existing reporting and information systems	Reporting and information systems improved	2002–2005	MoH/NMCP WHO	USD 20 000	
20. To procure project transportation, equipment and supplies to improve the supervision and monitoring of project activities at all levels	Transportation, equipment and supplies procured	2002–2005	WHO UN agencies Others	USD 30 000	
				TOTAL: USD 110 000	

Specific Objective VIII:	STRENGTHENED CAPABILITIES FOR OPERATIONAL RESEARCH			
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
To design research protocols, carry out studies and prepare final reports	Protocols designed, studies conducted and final reports prepared	2005-2005	MoH/NMCP WHO ECHO NGOs Research Institutions Others	USD 40 000
				TOTAL: USD 40 000

Specific Objective IX:		INCREASED COMMUNITY AWARENESS AND PARTICIPATION IN MALARIA CONTROL AND PREVENTION				
ACTIVITIES		OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST	
family care practices th of IEC mate raising sess	en community and and prevention brough the provision rials, awarenessions, community ills building and	Malaria care and prevention practices strengthened	2002–2005	MoH/NMCP WHO UN agencies NGOs Community Others	USD 160 000	
practices fo treatment o personal pr	ssessment of or the recognition and f malaria and otection conducted in velop an effective IEC	KAP study designed and conducted	2002–2005	MoH/NMCP WHO UN agencies NGOs Community Others	USD 5 000	
including de targeted IEC	C service capacity evelopment of C materials and IEC nt and monitoring	Targeted IEC materials developed; IEC campaign implemented and monitored	2002-2005	MoH/NMCP WHO UN agencies NGOs Media Others	USD 100 000	
					TOTAL: USD 265 000	

Specific Objective X:	ENHANCED INTERSECTORAL COLLABORATION				
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST	
9. To set up National Multi– Sectoral Committee and ensure its functionality	National Multi–Sectoral Committee established and functioning	2002-2005	MoH/NMCP GOs WHO	To be borne by the Government	
10. To define situations where collaboration is needed and establish mechanisms to promote collaboration within the project areas	Situations defined and mechanisms established	2002–2005	MoH/NMCP GOs	To be borne by the Government	
To coordinate the exchange of information about all development activities relevant to malaria within the project areas	An effective system of communication on malaria between health and non-health sectors established and exchange of information coordinated	2002–2005	MoH/NMCP GOs	To be borne by the Government	
12. To identify and mobilize additional resources required for malaria control from non-health sectors	Additional resources identified and mobilized	2002-2005	MoH/NMCP GOs	To be borne by the Government	

# XIII. PROJECT MANAGEMENT AND TIMEFRAME

The project will be implemented by the Ministry of Health and the National Malaria Control Programme, with technical and financial support from WHO and other existing/potential donors and partners. The project management structure is as outlined below:

At the central level: The director and staff of the National Centre for Tropical Disease Control will be responsible for the implementation of project activities. A Project Committee (comprised of NCTDC staff, NGOs, WHO and other partners) will be established in order to facilitate the coordination and implementation of the project. NCTDC personnel will undertake field visits to supervise the performance of work carried out in the field. WHO consultants will be recruited to assist in the planning, implementation and evaluation of project activities. Implementation of some project activities such as disease management, health education, community mobilization, and promotion of ITMNs, as well as other initiatives, will be sub–contracted to international NGOs.

At the regional (oblast)/district (rayon) levels: Focal points for the project (Directors of Regional Tropical Disease Control Centres) will be designated to ensure improved communication and coordination between the central and district levels. Regional and district malaria programme staff will be responsible for all project—related activities in their respective areas. Community—based organizations and groups will be involved in the implementation of the project activities at the grass roots level. Technical advice will be provided by regional/district specialized personnel.

WHO will provide overall technical backstopping and the strategic coordination of project activities with UN agencies and other concerned. UN agencies and other organizations will concentrate mostly on

the development of human resources and improving access to and quality of malaria care and prevention. The project will be implemented in full consultation with the UN/NGOs/Government/RBM Partners in order to enhance coordination amongst and between UN agencies, NGOs and the Government and thus maximize the impact of assistance. The project is planned for a period of four years (2002-2005).

# VIII. PROJECT MONITORING AND EVALUATION

Monitoring and evaluation will be a critical and continuous process of reviewing the progress of the project and identifying problems and constraints, with the purpose of pinpointing the required areas of action for enhanced effectiveness of the project. Comprehensive monitoring and evaluation will be carried out by the National Implementing Agency, in collaboration with WHO/EURO, at regular intervals. An impact assessment survey will be carried out at the end of the project. Monitoring and evaluation will be based on the participation of all stakeholders.

The WHO Regional Office for Europe will provide technical clearance of the Project Document prior to the start of the project. Project management will prepare a project implementation plan during the first month of the start the project. The project will be subject to annual reviews and reporting. The project's final draft will be prepared in advance to allow review and technical clearance by WHO. Project management will be responsible for the preparation and submission of the project evaluation reports. Specific monitoring and evaluation methods, schedules and indicators will be developed for the project at its outset (see *Annex 4*).

### IX. RISKS

The implementation and management of the project should be reviewed periodically to ensure that it remains on track.

A continuous flow of inputs from different UN agencies and other donors is critical to the success of the RBM Project in Tajikistan. There is some risk that the funding agencies may not be able to provide and/or sustain the level of inputs required to see a visible project impact. An insufficient amount of funding would limit the scope of the project activities.

The risk of putting excessive demands on the existing country capacities, arising out of the lack of a reliable health infrastructure in some project areas, also exists.

## XI. PROJECT BUDGET

The project budget is estimated at <u>USD 3 475 000</u>, funds which will be contributed by the Government, WHO, ECHO, USAID and other donors (see <u>Table below</u>). The Government will cover operational costs of the existing NMCP/public health staff to be involved in the implementation of project activities. The annual input of **USD 300 000** is **the bare minimum** to implement disease management activities only. Larger resources of **USD 600 000**, allocated annually for the project, will allow for an increase in the scope and volume of project activities and implement selective vector control operations. Full-scale implementation will bring the project financial requirements to **USD 800 000–900 000** per year.

Table: Estimated Project Budget, 2002-2005

	2002	2003	2004	2005
DESCRIPTION	USD	USD	USD	USD
Technical Expertise:	002	332	332	002
International Experts	25 000	25 000	25 000	25 000
RBM Field Office	60 000	60 000	60 000	60 000
Duty Travel	15 000	15 000	15 000	15 000
Sub-Total:	100 000	100 000	100 000	100 000
Equipment - Expendable:				
Drugs and Laboratory supplies	80 000	80 000	80 000	80 000
Diagnostic kit supplies	15 000	15 000	15 000	15 000
Insecticides/equipment for indoor spraying	250 000	250 000	250 000	250 000
Equipment for application of antilarval measures	10 000	10 000	10 000	10 000
Mosquito nets and insecticides for impregnation	100 000	100 000	100 000	100 000
Equipment - Non-Expendable:				
Laboratory Equipment	20 000	20 000	20 000	20 000
Transportation	5 000	5 000	5 000	5 000
Project Equipment and Supplies	5 000	-	5 000	-
Cub Tatal	405.000	480.000	405.000	400.000
Sub-Total: Quality Assessments/Assurance:	485 000	480 000	485 000	480 000
Quality of care assessments	10 000	10 000	10 000	10 000
Supervision and quality control of laboratory	10 000	10 000	10 000	10 000
services				
Problems and Needs Assessments	5 000			
KAP Study	45 000	40 000	40 000	40 000
IEC Service Capacity Building				
RBM Advocacy and Partnership Building	5 000	5 000	5 000	5 000
Implementation Cost	60 000	60 000	60 000	60 000
_	00 000	00 000	00 000	
Impact Study				5 000
RBM Surveillance Mechanisms	10 000	10 000	5 000	5 000
Training:				
In-Service Training:				
Development and production of training materials	20 000	20 000	10 000	-
Central and intermediate level training	40 000	30 000	15 000	15 000
Peripheral level training for public health	60 000	60 000	40 000	20 000
personnel				
International Training:	40.000	40.000	40.000	
Training in malaria and its control	10 000	10 000	10 000	10 000
Community Capacity Building	25 000	25 000	25 000	25 000
Operational Research	10 000	10 000	10 000	10 000
Monitoring/Evaluation	20 000	20 000	15 000	15 000
Misselleneeve				
Miscellaneous: Operation and Maintenance	3 000	3 000	3 000	3 000
Operation and Maintenance Sundries	2 000	2 000	2 000	2 000
TOTAL:	920 000	895 000	845 000	815 000

## **ANNEXES**

## Annex 1: The Malaria Situation in Tajikistan, 1992–2000

	1992	1993	1994	1995	1996	1997	1998	1999	2000
Number of <i>P. vivax</i> malaria cases	301	619	2411	6103	16561	29794	19164	13458	18233
Number of <i>P. falciparum</i> malaria cases	1	1	1	1	-	1	187	335	831
Total number of malaria cases	301	619	2411	6103	16561	29794	19351	13493	19064

## Annex 2: Malaria situation in Tajikistan by Regions (Oblasts) 1996-2000

REGIONS	7	TOTAL NUMBER OF	MALARIA CASES/	<i>P. falciparum</i> malari	a
	1996	1997	1998	1999	2000
DUSHANBE	1222	1199	815/2	574/50	766/9
DISTRICTS OF REPUBLICAN SUBORDINATIO N	1218	1949	1968/3	1695/18	3975/159
LENINABAD	15	199	137/0	898/1	2513/2
G. B. A. O.	831	1083	1018/2	193/1	138/0
KHATLON	13275	25364	15413/173	10133/265	11672/661
TOTAL	16561	29794	19351/187	13493/335	19064/831

## Annex 3: RBM project areas in Tajikistan 2002–2005

### 1. Khatlon Region (24):

- 1. Kyrgan Tjube City
- 2. Baljuan District
- 3. Bokhtar District
- 4. Vaskhsh District
- 5. Ghozimalik District
- 6. Voce District
- 7. Dangara District
- 8. Jilikul District
- 9. Kabodian District
- 10. Kolkhozabad District
- 11. Kulyabsky District
- 12. Kumsangir District
- 13. Moskovsky District
- 14. Muminobad District
- 15. Nyrek District
- 16. Parkhar District
- 17. Pyanj District
- 18. Sarband District
- 19. Sovetski District
- 20. Khovaling District
- 21. KhochamastonDistrict
- 22. Shaartuz District
- 23. Shuroobad District
- 24. Yavan District

## 2. Districts of Republican Sub-ordination (9):

- 1. Kofarnihon District
- 2. Leninskiy District
- 3. Tursun Zade District
- 4. Faizabad District
- 5. Garm District
- 6. Gissar District
- 7. Darband District
- 8. Tavildara District
- 9. Shahrinav District

## 3. Leninabad Region (7):

- 1. Matchinskiy District
- 2. Nauskiy District
- 3. Ashtskiy District
- 4. Pendzekentskiy District
- 5. Kanibadam District
- 6. Kairakum City
- 7. Khodzhentskiy District

## 4. Gorno-Badakhshan Autonomous Region (2):

- 1. Vanchskiy District
- 2. Darwazskiy District

## **Annex 4:** Monitoring and Evaluation Indicators

<u>Ou</u>	tput (process) indicators:
	Percentage of project districts with adequate amount of learning and IEC materials
	Percentage of project districts with adequately advocated/trained people
	Percentage of project districts with adequate provision of equipment, drugs, insecticides, mosquitonets and other supplies
	Percentage of project districts under regular supervision of indoor residual spraying/malaria diagnosis and treatment/laboratory services
	Percentage of project districts/population under surveillance
	Type and quantity of operational research planned to be conducted/underway
<u>Ou</u>	tcome indicators:
	Percentage of project districts where vector control operations (indoor residual spraying and/or antilarval measures and/or the use of impregnated mosquito nets) have been correctly applied and all active foci are covered by the above–mentioned interventions
	Percentage of project districts where more than 75% of patients are diagnosed/properly treated in the formal and informal sectors
	Percentage of project districts where more than 75% of formal/informal care providers use updated knowledge and built–up skills in diagnosis and treatment/management of malaria
	Percentage of project districts where more than 75% of households' families and mothers are award of symptoms/diagnosis/treatment/referral and are capable of providing appropriate self–diagnosis
<u>lm</u>	pact indicators (to estimate the effect of large-scale interventions within project areas)
	As a result of improved coverage and quality of vector control (indoor residual spraying, antilarval measures and mosquito nets):  A decrease in the incidence/prevalence of P. vivax and P. falciparum infections/diseases Prevention of malaria outbreaks Prevention of the re-establishment of transmission of P. falciparum malaria Prevention of malarial deaths
	As a result of improved coverage and effectiveness of mass drug administration: A decrease in the incidence and prevalence of P. vivax and P. falciparum malaria
	As a result of improved coverage and quality of diagnosis and radical treatment of P. vivax and treatment of uncomplicated P. falciparum malaria:  Prevention of relapses of P. vivax malaria  A decrease in the incidence of severe and complicated P. falciparum malaria  A decrease in the incidence of malarial deaths
	As a result of improved coverage and quality of management of severe/complicated P. falciparum malaria:  A decrease in the case fatality rate

## **ROLL BACK MALARIA**

## PROJECT DOCUMENT

# MINISTRY OF HEALTH REPUBLIC OF TURKMENISTAN

# WORLD HEALTH ORGANIZATION REGIONAL OFFICE FOR EUROPE

Title: The Roll Back Malaria Project

Duration: 4 years, January, 2002 – December, 2005

Project Sites: Selected districts (5 etraps) in Maysky, Labapsky, Balkansky and

Dashogyzsky velajats and Ashgabad

Intended Beneficiaries: About 500 000 indigenous people and migrants

Requesting Agency: WHO

Govt. Cooperating Agency: Ministry of Health, Turkmenistan

Estimated Starting Date: January 2002

Estimated Project Budget: 2002: USD 265 500

2003: USD 235 500 2004: USD 230 500 2005: USD 215 500

TOTAL (2002-2005): USD 947 000

### **BRIEF DESCRIPTION**

Malaria was eradicated in Turkmenistan in the 1960s. However, as a result of the deterioration of the malaria situation in some Newly Independent States (NIS) and other neighbouring countries in Central Asia, the malaria situation worsened and local transmission of malaria has re-commenced. During 1997–1998, the number of malaria cases increased sharply, and 137 cases were reported. The malaria outbreak was contained, but autochthonous cases of malaria continue to be reported in the country. The National Malaria Prevention and Control Programme is at present implemented and supported by WHO, and activities consist of disease management, training, malaria surveillance and selective vector control. The limited resources invested by the Government and WHO result in a lack of funding to cope with the malaria problem in the country.

The RBM Project will support Turkmenistan in building partnerships and working together in the promotion of health-related actions that reduce the incidence of malaria and eradicate the disease in the country. The project will focus on addressing malaria–related issues through capacity building, improving capacities for and access to early diagnosis/adequate treatment and timely response to and prevention of malaria outbreaks, reinforcing surveillance mechanisms and increasing community awareness and involvement in malaria prevention. Implementation of the RBM Project will be a collaborative effort of the Ministry of Health in cooperation with WHO and other potential partners and donors. The project is planned for a period of 4 years (2002-2005). The project will have a strong but flexible management structure capable of mobilizing partnerships amongst UN agencies and NGOs as well as the media and other partners/donors in implementing cost–effective but technically sound and sustainable malaria control measures adapted to the country's conditions and responding to local needs.

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### X. HISTORICAL CONTEXT

The new Director General of WHO committed herself to an intensive response to the global malaria burden and proposed the *Roll Back Malaria Initiative (RBM)* in January 1998. A global coalition to Roll Back Malaria, characterized by strategic synergy, co-ordinated effort, and science-based strategies, was proposed at the World Health Assembly in 1998. The Global Partnership to RBM, consisting of WHO, UNICEF, UNDP, World Bank and a group of National Government representatives, heads of bilateral donor organizations, representatives of the private sector, and non-governmental bodies was formally established in December 1998. Members of the Global RBM Partnership are committed to supporting country-level efforts that are led by national authorities within the context of their multisectoral strategies for development and poverty alleviation.

A meeting to establish a partnership to Roll Back Malaria in the Central Asian Republics was held in Tashkent, Uzbekistan in July 1999. Commitment to build up a Regional RBM Partnership was the main outcome of the meeting. A RBM country project proposal was drawn up by the Ministry of Health in close collaboration with the WHO Regional Office for Europe and submitted to potential donors and partners in 2000. The RBM Project supports the country in partnership building and working together in the promotion of health sector actions that reduce the incidence of malaria and finally eradicate the disease in the country.

The malaria burden has become a major obstacle to development in Turkmenistan, where at present more than 1 million, or 20 percent of the total population live in areas where conditions for the transmission of malaria are favourable. There were 137 malaria cases in 1997, the highest rate of malaria morbidity to be reported in the country over the past 50 years (see *Annex 1*). Outbreaks of malaria have been the result of the deterioration of the malaria situation in neighbouring countries of Central Asia, massive cross—border population movements and lack of appropriate malaria control. The malaria situation is aggravated by continuous importation of malaria into the country.

The malaria control programme in Turkmenistan is funded by the Government of Turkmenistan and WHO. However, at present resources invested for malaria control by the Government and WHO are limited, and the country is in need of additional external assistance to cope with the malaria problem.

### XI. CURRENT MALARIA SITUATION

Malaria was eradicated in Turkmenistan in 1960. Between 1965 and 1980, only 23 autochthonous cases of malaria were reported in Mary and Akhal districts of the country. In the 1980s, most cases were reported among military personnel who had returned from Afghanistan.

In recent years, with the deterioration of the malaria situation in Central Asia, the number of cases imported into Turkmenistan has risen sharply. In 1998, a local outbreak of malaria was reported, and 137 cases were recorded in areas situated along the Afghan–Turkmenistan border (see Annex 1). Owing to epidemic control measures applied, the number of malaria cases dropped significantly, and only 24 cases were reported by the country in the year 2000. At present the malaria situation remains very unstable, particularly in areas bordering Afghanistan, where cross-border movement, including that of infected carriers, takes place and favourable conditions for malaria transmission exist.

### III. HOST COUNTRY STRATEGY

### III.A. NATIONAL STRATEGY

Turkmenistan has committed itself to malaria control, and in 1999, the national health authorities, in collaboration with the WHO Regional Office for Europe, developed the National Malaria Control Programme which is being implemented. The four elements of the Programme are as follows:

**Disease Prevention:** to plan and implement sustainable preventive measures

**Disease Management:** to provide early diagnosis and prompt treatment

**Epidemic Control:** to detect early outbreaks and prevent the further spread of malaria

epidemics

**Programme Management:** to strengthen institutional capacities of the National Malaria Control

Programme and surveillance mechanisms

### III.B. INSTITUTIONAL FRAMEWORK FOR MALARIA CONTROL

The National Parasitological Service, as a part of the Sanitary and Epidemiological Inspection, is responsible for technical guidance, planning, monitoring and evaluation of malaria control in the country. NPS staff is comprised of epidemiologists, parasitologists, entomologists, laboratory technicians and administrative staff, with some of these positions vacant, particularly at peripheral levels. At the regional (velajat) level, the heads of regional centres of sanitary and epidemiological inspection are responsible for the implementation of malaria control activities in the respective area. The team includes epidemiologists, parasitologists, entomologists and laboratory personnel. At the district (etrap) level, the head of the district centre of sanitary and epidemiological inspection has overall responsibility for all malaria-related activities in the area. At regional and district levels, disease management activities related to malaria are carried out by specialized and general health services equipped with microscopic facilities, most of which require upgrading.

Currently, malaria control interventions consist mainly of vector control, disease management, training, surveillance, procurement and distribution of supplies/equipment.

### III.C. PRIOR AND ONGOING ASSISTANCE

**WHO** assistance focuses on strengthening the National Malaria Control Programme through technical assistance and consultations, international/local training, fellowships, the provision of antimalarial drugs, laboratory equipment/supplies, insecticides and equipment for spraying, as well as providing means of transportation.

### IV. PROJECT JUSTIFICATION

In face of the re–establishment of malaria transmission in border areas with Afghanistan and a real threat of a resumption of malaria transmission in other areas of the country, the project attempts to change this unfavourable malaria trend, particularly in epidemic–prone border areas, where autochthonous cases of *Plasmodium vivax* malaria are reported. The practical technical and operational modalities on dealing with malaria by specialized services and the public health sector, as well as the community itself, are the expected outcomes of the RBM Project, funded by a number of international agencies/organizations and implemented by the Government of Turkmenistan. The project will have a strong but flexible management structure capable of mobilizing the partnership among the Ministry of Health, UN agencies and other donor agencies and countries, NGOs and the media in implementing cost-effective but technically sound and sustainable malaria control adapted to the country's conditions and responding to local needs.

### IV.A. PROBLEMS TO BE ADDRESSED

#### Problem I:

The transmission of malaria is particularly concentrated in areas along the Afghan–Turkmenistan border. The availability of efficient malaria vectors and failure to maintain previously effective vector control has resulted in an increase in vectorial capacity and the re–establishment of malaria transmission. Population movements within the country, as well as cross–border migration, including that of infected persons, is one possible reason for outbreaks amongst vulnerable non-immune people and the re–introduction of malaria into areas which were previously free from this disease.

### **Problem II:**

Shortages of insecticides and limited use of antilarval operations results in a limited impact of the vector control operations.

### **Problem III:**

Under-equipped and under-supplied existing health facilities result in inadequate quality of disease management and prevention.

### **Problem IV:**

There is a lack of malaria surveillance, particularly at the periphery.

### **Problem V:**

Communities' lack of knowledge and skills to prevent themselves from malaria results in scant use of personal protective measures. The majority of the population still carry numerous misconceptions about malaria, and they are not aware of the preventive measures which may be taken.

### **Problem VI:**

Limited resources invested by the Government and WHO results in a lack of adequate funding to cope with the malaria problem.

### IV.B. TARGET LOCATIONS AND INTENDED BENEFICIARIES

During 2002-2005, assistance should be provided for the selected districts (5 etraps: Atamuratskij, Garrygal'nskij, Serhedabadskij, Tahtabasarskij and Ko'tendalskij) in Marysky, Lebapsky, Balkansky and Dashogyzsky regions (velajats) and Ashgabad (see Annex 2). In general, the target beneficiaries will be 500 000 indigenous people and migrants entering the country for various reasons.

### IV.C. SUCCESS IMPACT INDICATORS

A base-line survey conducted in project areas will provide an assessment of the malaria-related problems and needs at the beginning of the project, whereas a terminal evaluation carried out at the end of project will bring to light improvements in the malaria situation which might have occurred as a result of project interventions.

In the short term, the project is likely to reduce the incidence of malaria and prevent a resumption of malaria transmission in areas where it had been eradicated in the past.. Sustaining the project activities beyond 2005 could reduce the impact of malari to a sufficiently low level so that it no longer represent a public health problem.

### XIV. PROJECT STRATEGY AND PRIORITY INTERVENTIONS

The above will be addressed by actions in specific priority areas, all of which are in line with the following strategic components of the Project and incorporated into the four elements of the National Malaria Control Strategy.

<u>Component I:</u> STRENGTHENING INSTITUTIONAL CAPACITIES OF THE NATIONAL

MALARIA CONTROL PROGRAMME/GENERAL HEALTH SERVICES AND ENHANCING CAPACITY FOR DECISION-MAKING RELATED TO

MALARIA AND ITS CONTROL/PREVENTION

To be effective, the national plan of actions for malaria prevention and control should be implemented through properly organized and managed specialized and general health services. To facilitate the execution of the RBM project in Turkmenistan, some important aspects in the implementation and management of malaria prevention and control programme, notably responsibility, authority and accountability for work done, resources used and outputs/outcomes produced at all levels should be reviewed. To provide adequate technical and operational guidance in a satisfactory manner, the National Centre of Tropical Diseases Control will be established. Staff of specialized health services should be trained in programme management. Technical assistance and back—up will be provided by WHO.

### Component II: BUILDING UP RBM PARTNERSHIP

RBM will address malaria as a priority health issue within the context of sustainable health sector development in Turkmenistan. WHO will provide strategic direction, coordination and technical/financial support for malaria control interventions under RBM. Other partners involved in the RBM Project will mobilize additional funds for RBM interventions.

# Component III: IMPROVING CAPACITIES FOR & ACCESS TO EARLY DIAGNOSIS AND ADEQUATE TREATMENT OF MALARIA

An established and properly functioning system for the identification of cases, reliable and early diagnosis, effective and prompt treatment, and follow-up of treatment results comprise fundamental parts of the project. Since microscopic examination remains the most reliable and least expensive way to diagnose malaria, diagnostic laboratory facilities will be upgraded within project areas. Dip Stick-like technologies with algorithms for the simple and labour-time-saving diagnosis of malaria have been introduced as a supplement to make the diagnosis of malaria adequate.

# Component IV: IMPROVING CAPACITIES FOR TIMELY RESPONSE TO AND PREVENTION OF MALARIA EPIDEMICS

All epidemic-prone areas will be identified and potential situations forecasted. Emergency preparedness for and mechanisms of response to malaria epidemics will be improved. Contingency plans for epidemic control, including indoor spraying, will be worked out and the reserve of drugs, insecticides and spraying equipment will be maintained for rapid deployment. Basic Health Staff will be trained to recognize epidemic situations and to build up community preparedness.

### Component V: CAPACITY BUILDING

Training is a key component of the project. In–service training in disease management and prevention will be conducted for all categories of specialized programme and public health personnel within project areas. Laboratory personnel will be trained in malaria microscopy. Basic training will be supplemented by regular supervision and refresher training courses. The training will be practical in nature and directed towards developing skills and competence.

### Component VI: REINFORCING RBM COUNTRY SURVEILLANCE MECHANISM

A base-line survey to assess problems and needs related to malaria will be carried out at the beginning of the project. Mechanisms for regular collection, processing and analysis of operational, epidemiological and socio-economic data relevant to planning/re-planning, implementation, monitoring and evaluation of the project activities will be built in. The existing reporting and information system will be improved. The survey data will provide a systematic way to determine whether the project approaches and interventions and other inputs are appropriate and sufficient to achieve the stated targets and objectives.

# Component VII: INCREASING COMMUNITY AWARENESS AND PARTICIPATION IN MALARIA CONTROL/PREVENTION

The involvement of communities and their partnership with the formal and informal health sectors to empower them in their own health development is crucial. People need to be educated about malaria and its control/prevention and have access to adequate health care facilities. Existing treatment practices will be improved through the development and dissemination of clear messages on malaria and its treatment. Community and family care and preventive practices will be strengthened through the provision of IEC materials, skills building, traditional/mass media and community support. KAP assessments will conducted on ways to promote compatibility of practices, customs and beliefs of various social groups and minorities with existing malaria control/prevention options, and to develop effective IEC strategies and targeted IEC materials.

### Component VIII: STRENGTHENING RESEARCH CAPABILITIES

Operational research is essential for the planning, implementation and evaluation of the project activities, and this will comprise an integral part of the project. Such research will address not only the planning and effectiveness of specific interventions, but also cultural, behavioural, social and economic factors that might affect project interventions and outcomes.

### Component IX: ENHANCING INTERSECTORAL COLLABORATION

Additional resources for malaria control remain severely constrained. The social, economic and environmental problems posed by malaria exceed the jurisdiction and capabilities of the Ministry of Health. There is obviously a need for improved intersectoral collaboration, as well as for planning and information sharing, to see that additional funds are earmarked for malaria control. Such collaboration is best developed from a shared understanding of the underlying problems to be addressed. Information on development activities and the migration of organized and non-organized population groups will be collected and exchanged amongst all parties concerned. The Ministry of Health will stimulate the non-health sectors for active collaboration in malaria control, including mobilization of additional funds. National multi–sectoral committees will promote coordination and collaboration in malaria control among all concerned.

### XV. PROJECT OBJECTIVES, ACTIVITIES AND OUTPUTS

### VI.A. DEVELOPMENT OBJECTIVE

The development objective is to prevent malaria outbreaks, reduce the incidence of malaria, prevent its further spread across the country and minimize socio-economic losses provoked by the disease and finally eradicate malaria through the progressive strengthening of capacities and capabilities of health services and mobilizing community actions within the context of the Roll Back Malaria initiative in Turkmenistan.

## VI.B. SPECIFIC OBJECTIVES, ACTIVITIES AND OPERATIONAL OUTPUTS

Specific Objective I:	STRENGTHENED INSTITUTIONAL CAPACITIES OF THE NATIONAL MALARIA CONTROL PROGRAMME AND GENERAL HEALTH SERVICES AND ENHANCED CAPACITY FOR DECISION-MAKING RELATED TO MALARIA AND ITS CONTROL					
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST		
11. To render technical and managerial expertise and back-up for the RBM Project	WHO short-term consultants recruited and expert advice given wherever required	2002-2005	WHO	USD 40 000		
12. To train Regional/District Health Directors and Directors of Sanitary and Epidemiological Inspection in programme management to improve capacities for planning and implementation of the project activities	Regional/District Health Directors and Directors of Sanitary and Epidemiological Inspection involved in the project trained	2002-2005	MoH/NMCP WHO UN Agencies NGOs Others	USD 20 000		
13. To train selected Regional/District Medical Officers in the existing approaches to disease management, epidemic control and community mobilization	Regional/District MOs in project areas trained	2002-2005	MoH/NMCP WHO UN Agencies NGOs Others	USD 40 000		
6. To support international training selected NMCP personnel in malaria and its control as well as entomology	Selected NMPC personnel trained abroad	2002-2005	WHO MoH/NMCP Others	USD 40 000		
				TOTAL: USD 140 000		

Specific Objective II:	BUILT UP RBM COUNTRY PARTNERSHIP					
ACTIVITIES	OPERATIONAL	TIMEFRAME	POSSIBLE	ESTIMATED		
	OUTPUTS		PARTNERS	COST		
5. To identify partners and conduct RBM advocacy through workshops and meetings and message development to obtain broad, inter-sectoral commitment at different levels in the country	Partners identified  Targeted RBM advocacy activities conducted among various partners at all levels	2002–2005	WHO UN agencies MoH/NMCP NGOs/GOs Informal Sector Media Others	USD 10 000		
				TOTAL: USD 10 000		

Specific Objective III:	IMPROVED CAPACITIES FOR AND ACCESS TO EARLY DIAGNOSIS AND ADEQUATE TREATMENT OF MALARIA					
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST		
8. To select and train/retrain laboratory staff in malaria microscopy	Laboratory staff trained/re- trained	2002–2005	MoH/NMCP WHO UN Agencies NGOs Others	USD 30 000		
To upgrade laboratory facilities in selected health centres	Laboratory facilities set up and upgraded	2002-2005	MoH/NMCP WHO NGOs	To be borne by MoH		
10. To set up supervision and quality control system of laboratory services and ensure it is functional	Supervision and quality system of laboratory services set up and functioning	2002–2005	MoH/NMCP WHO NGOs Others	USD 20 000		
11. To set up care quality assessments system and ensure it is functional	Care quality assessments system set up and functioning	2002–2005	MoH/NMCP WHO NGOs Others	USD 20 000		
12. To develop/modify/produce training/learning materials on disease management and prevention	Training/learning materials developed and produced	2002–2005	MoH/NMCP WHO UN Agencies NGOs Others	USD 30 000		
13. To train BHS in case management	Basic health staff trained in case management	2002-2005	MoH/NMCP WHO UN agencies NGOs Others	USD 30 000		
14. To procure and distribute laboratory equipment/supplies, dipsticks and drugs/other items required for disease management	Supplies and equipment procured and delivered	2002–2005	WHO UN agencies NGOs Others	USD 100 000		
				Total: USD 230 000		

Specific Objective IV:	IMPROVED CAPACITAND PREVENTION			
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
22. To develop a monitoring mechanism for detection/forecasting epidemic risk factors	Monitoring mechanism developed	2002-2003	WHO MoH/NMCP	To be covered by WHO Consultant
23. To update NMCP operational guidelines and procedures related to detection and control of epidemics	Operational guidelines and procedures updated	2002-2003	MoH/NMPC WHO	To be borne by MoH
24. To improve emergency preparedness for and response to malaria epidemics in project areas where outbreaks are a recurring problem	Emergency preparedness for and response to malaria outbreaks improved	2002–2005	MoH/NMCP WHO	To be borne by MoH
25. To apply indoor residual spraying in case of emergency	Insecticides to be used in case of emergency procured	2002–2005	MoH/NMCP	To be borne by MoH
26. To train health personnel in epidemic control	Health personnel trained	2002–2005	MoH/NMCP WHO UN agencies NGOs Others	USD 30 000
6. To procure insecticides and equipment for spraying	Insecticides and equipment procured	2002-2005	WHO UN agencies Others	USD 280 000
				TOTAL: USD 310 000

Specific Objective V:	STRENGTHENED RBM COUNTRY SURVEILLANCE MECHANISM				
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST	
21. To design and carry out a base– line survey to assess needs and problems related to malaria and impact assessment survey	A base–line survey and impact surveys carried out	2002-2005	MoH/NMCP WHO	USD 10 000	
22. To identify operational and epidemiological indicators needed for monitoring/evaluation of project activities	Operational and epidemiological indicators identified	2002	MoH/NMCP WHO	To be covered by Consultant	
23. To train personnel of NMPSs and SEIs in data collection, processing and analysis	Personnel of NMPSs and SEIs trained	2002–2005	MoH/NMCP WHO UN agencies NGOs Others	USD 20 000	
24. To establish and maintain the project's operational and epidemiological database	Operational and epidemiological database established and maintained	2002–2005	MoH/NMCP WHO	To be borne by MoH	
25. To improve the existing reporting and information systems	Reporting and information systems improved	2002–2005	MoH/NMCP WHO	To be borne by MoH	
26. To procure project transportation, equipment and supplies to improve supervision and monitoring of project activities at all levels	Transportation, equipment and supplies procured	2002–2005	WHO UN agencies Others	USD 20 000	
7. To undertake monitoring of project activities	Monitoring undertaken	2002-2005	MoH/NMCP WHO NGOs	USD 20 000	
				TOTAL: USD 70 000	

Specific Objective VI:	INCREASED COMMUNITY AWARENESS AND PARTICIPATION IN MALARIA CONTROL AND PREVENTION						
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST			
10. To strengthen community and family care and prevention practices through provision of IEC materials, awareness raising sessions, community support, capacity building and mass media	Malaria care and prevention practices strengthened	2002–2005	MoH/NMCP UN agencies WHO NGOs Others	USD 40 000			
11. To conduct rapid assessments on practices of recognition and treatment of malaria and personal protection in order to develop effective IEC strategy	KAP study designed and conducted	2002	MoH/NMCP WHO UN agencies NGOs Community Others	USD 5,000			
To build IEC service capacity including development of targeted IEC materials and IEC management and monitoring	Targeted IEC materials developed; IEC campaign implemented and monitored	2002-2005	MoH/NMCP WHO UN agencies NGOs Media Others	USD 40 000  TOTAL:			
				USD 85 000			

Specific Objective VII:	STRENGTHENED CAPABILITIES FOR OPERATIONAL RESEARCH					
ACTIVITIES	OPERATIONAL	TIMEFRAME	POSSIBLE	ESTIMATED		
	OUTPUTS		PARTNERS	COST		
To design research protocols, carry out studies and prepare final reports	Protocols designed, studies conducted and final reports prepared	2002	MoH/NMCP WHO ECHO NGOs Research Institutions Others	USD 30 000  TOTAL: USD 30 000		

Specific Objective VIII:	ENHANCED INTERSECTORAL COLLABORATION					
ACTIVITIES	OPERATIONAL	TIMEFRAME	POSSIBLE	ESTIMATED		
	OUTPUTS		PARTNERS	COST		
13. To set up a National Multi– Sectoral Committee and ensure its functionality	National Multi–Sectoral Committee established and functioning	2002-2005	MoH/NMCP GOs WHO	To be borne by the Government		
14. To define situations where collaboration is needed and establish mechanisms to promote collaboration within the project areas	Situations defined and mechanisms established	2002–2005	MoH/NMCP GOs	To be borne by the Government		
15. To coordinate the exchange of information about all development activities relevant to malaria within the project areas	An effective system of communication on malaria between health and non-health sectors established and exchange of information coordinated	2002–2005	MoH/NMCP GOs	To be borne by the Government		
16. To identify and mobilize additional resources required for malaria control from non-health sectors	Additional resources identified and mobilized	2002-2005	MoH/NMCP GOs	To be borne by the Government		

### XVI. PROJECT MANAGEMENT AND TIMEFRAME

The project will be implemented by the Ministry of Health, National Parasitological Service with technical and financial support of WHO and other donors and partners. The project management structure is as outlined below.

At the central level: The Director of the National Parasitological Service will be designated as Project Manager and be responsible for implementation of project activities. Personnel of parasitological service from the central level will undertake field visits to supervise the performance of work done in the field. WHO consultants will be recruited to assist in the planning and evaluation of the project activities. Implementation of project activities such as health education, community mobilization etc. would be sub–contracted to NGOs.

At the regional (velojat)/district (etrap) levels: Focal points for the project (Chiefs of Regional/District Sanitary and Epidemiological Inspection) will be designated for better communication and coordination between the central and district levels. Staff of Regional/District parasitological and public health services will be responsible for all project—related activities in their respective areas. Community—based organizations and groups will be involved in the implementation of the project activities at the grass roots level. Technical advice will be provided by regional/district specialized health personnel.

WHO will provide overall technical backstopping and strategic coordination of project activities with UN agencies/NGOs and others concerned. International agencies and other organizations will concentrate on the development of human resources and improving access to and quality of malaria care and prevention. The project will be implemented in full consultation with all agencies and organizations involved in order to enhance coordination and maximize the impact of assistance. The project is planned for a period of four years (2002-2005).

### VIII. PROJECT MONITORING AND EVALUATION

Monitoring and evaluation will be a critical and continuous process of reviewing the progress of the project and its problems and constraints, with the sole purpose of identifying the required areas of action for its enhanced effectiveness. Comprehensive monitoring and evaluation will be carried out by the National Implementing Agency, in close collaboration with WHO/EURO, at regular intervals. An impact assessment survey will be carried out at the conclusion of the project. Monitoring and evaluation will be based on the participation of all stakeholders.

The WHO Regional Office for Europe will provide technical clearance of the Project Document prior to the start of the project. Project management will prepare a project implementation plan during the first month of the start the project. The project will be subject to annual reviews and reporting. The project's final draft will be prepared in advance to allow review and technical clearance by WHO. Project management will be responsible for the preparation and submission of the project evaluation reports. Specific monitoring and evaluation methods, schedules and indicators will be developed for the project at the start of the project (see Annex 3).

### IX. RISKS

The RBM Project in Turkmenistan is a new initiative. The implementation of the RBM strategy could entail some risk. The implementation and management of the Project should be reviewed periodically to ensure it remains on track.

A continuous flow of inputs from different UN agencies and other donors is critical to the success of the RBM Project in Turkmenistan. There is some risk that the funding agencies might not be able to provide and/or sustain the level of inputs required to see a visible project impact. An insufficient amount of funds would also limit the scope of project activities.

### X. PROJECT BUDGET

The total project budget, estimated at <u>USD 947 000</u>, would be contributed by the Government, WHO and other donors (see Table below). The Government will cover operational costs of involving the existing NMCP/public health staff in the implementation of project activities.

Table: Estimated project budget for 2002-2005

DESCRIPTION	2002	2003	2004	2005
DESCRIPTION	USD	USD	USD	USD
Technical Expertise: International Experts Duty Travel	10 000 15 000	10 000 15 000	10 000 15 000	10 000 15 000
Sub-Total:	25 000	25 000	25 000	25 000
Equipment - Expendable: Drugs & Laboratory supplies Insecticides/equipment for indoor spraying	10 000 70 000	10 000 70 000	10 000 70 000	10 000 70 000
Equipment - Non-Expendable: Laboratory Equipment Transportation Office equipment/supplies	15 000 5,000 5 000	15 000 - -	15 000 5 000 5 000	15 000 - -
Sub-Total:	105 000	95 000	105 000	95 000
Quality Assessments/Assurance:	5 000 5 000	5 000 5 000	5 000 5 000	5 000 5 000
Problems & Needs Assessments	5 000			
KAP Study IEC Service Capacity Building	15 000	10 000	10 000	10 000
RBM Advocacy & Partnership Building	2 500	2 500	2 500	2 500
Impact Assessment				5 000
Training:  In- Service Training: Development & Production of training materials	20 000	10 000	-	-
<ul> <li>Central and intermediate level training</li> <li>Peripheral level training for public health personnel</li> <li>International Training:</li> </ul>	15 000 30 000	15 000 20 000	15 000 25 000	15 000 25 000
Training in malaria and its control	10 000	10 000	10 000	10 000
Operational Research	10 000	10 000	10 000	-
Community Capacity Building	10 000	10 000	10 000	10 000
Monitoring/Evaluation	5 000	5 000	5 000	5 000
Miscellaneous: Operation & Maintenance Sundries	2 000 1 000	2 000 1 000	2 000 1 000	2 000 1 000
TOTAL:	265 500	235 500	230 500	215 500

## **ANNEXES**

## Annex 1: The Malaria Situation in Turkmenistan, 1991–2000

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Autochthonous malaria	13	5	1	1	0	3	4	115	10	18
Imported cases	4	6	2	8	10	11	10	22	39	6
Plasmodium Vivax					8	14	14	137	49	24
Plasmodium Falciparum					2	0	0	0	0	0
Mixed infections					0	0	0	0	0	0
Total number of malaria cases	17	11	3	9	10	14	14	137	49	24

## Annex 2: RBM Project Areas in Turkmenistan, 2002-2005

- Atamuratskij etrap
- Garrygal'nskij etrap,
- Serhedabadskij etrap
- Tahtabasarskij etrap
- Ko'tendalskij etrap
- Ashgabad

The target project beneficiaries will be about 300 000 indigenous people and migrants.

## Annex 3: Monitoring and evaluation indicators

<u>Ou</u>	tput (process) indicators:
	Percentage of project districts with an adequate amount of learning and IEC materials
	Percentage of project districts with adequately advocated/trained people
	Percentage of project districts with adequate provision of equipment, drugs, insecticides, mosquito nets and other supplies
	Percentage of project districts under regular supervision of indoor residual spraying/malaria diagnosis and treatment/laboratory services
	Percentage of project districts/population under surveillance
Ou	tcome indicators:
	Percentage of project districts where vector control operations (indoor residual spraying and/or antilarval measures and/or the use of impregnated mosquito nets) have been correctly applied and all active foci are covered by the above–mentioned interventions
	Percentage of project districts where more than 75 % of patients are being diagnosed/treated correctly in the formal and informal sectors
	Percentage of project districts where more than 75 % of formal/informal care providers use updated knowledge and built–up skills in diagnosis and treatment/management of malaria
	Percentage of project districts where more than 75 % of households, families and mothers are aware of symptoms/diagnosis/treatment/referral and are capable of providing appropriate self–diagnosis
<u>lm</u>	pact indicators (to estimate the effect of large-scale interventions within project areas):
	As a result of improved coverage and quality of epidemic control measures:  A decrease in the incidence of P. vivax malaria  Prevention of malaria outbreaks  Prevention of re-establishment of transmission of P. vivax malaria
	As a result of improved coverage and quality of diagnosis and radical treatment of P. vivax:  Prevention of relapses of P. vivax malaria

## **ROLL BACK MALARIA**

## PROJECT DOCUMENT

## MINISTRY OF HEALTH REPUBLIC OF UZBEKISTAN

# WORLD HEALTH ORGANIZATION REGIONAL OFFICE FOR EUROPE

Title: The Roll Back Malaria Project

Duration: 4 years, January 2002 – December 2005

Project Sites: Selected districts and cities in Surhandarinskij, Karshinskij,

Samarqandskij, Jizakskij, Gulistonskij, Tashkentskij, Andizhanskij,

Namanganskij and Ferganskij Regions (9)

Intended Beneficiaries: About 3 600 000 indigenous people and migrants

Requesting Agency: WHO

Govt. Cooperating Agency: Ministry of Health, Uzbekistan

Estimated Starting Date: January 2002

Estimated Project Budget: 2002: USD 358 000

2003: USD 323 000 2004: USD 328 000 2005: USD 293 000

TOTAL (2002-2005): USD 1 302 000

### **BRIEF DESCRIPTION**

Malaria was eradicated in Uzbekistan in 1961. However, Uzbekistan continued to remain highly vulnerable to a resumption of malaria transmission, particularly along the border with Tajikistan. At present, the malaria situation is aggravated by the increase in migration of people between the two countries. This is reflected in the number of malaria cases imported into Uzbekistan: 27 in 1995, 51 in 1996, 52 in 1997, 74 in 1998, 78 in 1999 and 80 in 2000. During 1995–2000, 415 cases of malaria were reported in the country, of which 53 were autochthonous. In 2001, the reported number of malaria continued to rise, particularly in border areas with Tajikistan. The malaria situation in border areas remains serious, and its deterioration can be expected in the future. The National Malaria Prevention and Control Programme is at present implemented and supported by WHO, and activities consist of disease management and prevention, training and surveillance. However, the limited resources invested by the Government and WHO result in a lack of funding to cope with malaria problems in the country.

The RBM Project will support the country in building country partnership and working together to promote health-related actions that reduce the incidence of malaria and prevent a resumption of malaria transmission in other areas of the country. In Uzbekistan, the RBM Project will focus on addressing malaria-related issues through capacity building, improving capacities for and access to early diagnosis/adequate treatment and timely response to and the prevention of malaria outbreaks, reinforcing surveillance mechanisms, and increasing community awareness and involvement in malaria prevention. Implementation of the RBM Project will be a collaborative effort of the Ministry of Health in cooperation with WHO and other potential partners and donors. The project is planned for a period of 4 years (2002-2005). The project will have a strong but flexible management structure, capable of mobilizing the partnership among UN agencies and NGOs as well as the media and other partners/donors in implementing cost-effective but technically sound and sustainable malaria control adapted to the country's conditions and responding to local needs.

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### XII. HISTORICAL CONTEXT

The new Director General of WHO committed herself to an intensive response to the global malaria burden and proposed the *Roll Back Malaria Initiative (RBM)* in January 1998. A global coalition to Roll Back Malaria, characterized by strategic synergy, co-ordinated effort, and science-based strategies, was proposed at the World Health Assembly in 1998. The Global Partnership to RBM, consisting of WHO, UNICEF, UNDP, World Bank and a group of National Government representatives, heads of bilateral donor organizations, and representatives of private sector and non-governmental bodies was formally established in December 1998. Members of the Global RBM Partnership are committed to supporting country-level efforts that are led by national authorities within the context of their multisectoral strategies for development and poverty alleviation.

A meeting to establish a partnership for Roll Back Malaria in the Central Asian Republics was held in Tashkent, Uzbekistan in July 1999. Commitment to build up a Regional RBM Partnership was the main outcome of the meeting. The RBM Project will support the country in building partnerships and working together in the promotion of health sector actions that reduce the incidence of malaria and prevent a resumption of malaria transmission in other areas of the country.

The malaria problem may become a major obstacle to development in Uzbekistan, where nearly 3.6 million people, or 15 per cent of the total population, live in areas at risk of malaria where autochothonous and/or imported cases of malaria are presently reported. In 1996, 26 cases of malaria were reported (see *Annex 1*). During 1999–2001, the number of autochthonous cases of malaria continued to rise, and a trend towards the increase in malaria incidence in the country may be observed. The re–establishment of malaria transmission and occurrence of local malaria cases have been a result of the deterioration of the malaria situation in neighboring countries of Central Asia, massive cross–border population movements and lack of appropriate malaria control. The malaria situation is aggravated by a steady increase in the number of cases of imported malaria into the country over the past several years.

The malaria control programme in Uzbekistan is funded by the Government and WHO. However, at present, resources invested for malaria control by the Government and WHO are limited, and the country is in need of additional external assistance to cope with the malaria problem.

### XIII. CURRENT MALARIA SITUATION

Malaria was eradicated in Uzbekistan in 1961. However, Uzbekistan continued to remain highly vulnerable to a resumption of malaria transmission, particularly along the border with Tajikistan and Afghanistan. At present, the malaria situation is aggravated by the increase in migration of people between the two countries. This is reflected in the number of malaria cases imported into Uzbekistan: 27 in 1995, 51 in 1996, 52 in 1997, 74 in 1998, 78 in 1999 and 80 in 2000. During 1995–2000, 415 cases of malaria were reported in the country, of which 53 were autochthonous. In 2001, the reported number of cases of malaria continued to rise, particularly in border areas with Tajikistan. The malaria situation in border areas with Tajikistan and Afghanistan remains serious, and its deterioration can be expected in the future.

### III. HOST COUNTRY STRATEGY

### III.A. NATIONAL STRATEGY

Uzbekistan has committed itself to malaria control, and in 2000, the national health authorities, in collaboration with the WHO Regional Office for Europe, developed the National Malaria Prevention and Control Programme which is being implemented. The four elements of the Programme are as follows:

**Disease Prevention:** to plan and implement sustainable preventive measures

**Disease Management:** to provide early diagnosis and prompt treatment

**Epidemic Control:** to detect early outbreaks and prevent the further spread of malaria

epidemics

**Programme Management:** to strengthen institutional capacities of the National Malaria Control

Programme and surveillance mechanisms

### III.B. INSTITUTIONAL FRAMEWORK FOR MALARIA CONTROL

The National Parasitic Diseases Control Service (PDCS), as part of the National Sanitary and Epidemiological Service (NSES), is responsible for technical guidance, planning, monitoring and evaluation of malaria control in the country. NPDCS staff is comprised of epidemiologists, parasitologists, entomologists, laboratory technicians and administrative staff, with some of these positions vacant, particularly at peripheral levels. At the regional (velajat) level, the head of PDCS is responsible for the implementation of malaria control activities in the respective area. The team includes epidemiologists, parasitologists, entomologists and laboratory personnel. At the district level, the head of PDCS has overall responsibility for all malaria-related activities in the area. At regional and district levels, disease management activities related to malaria are carried out by specialized and general health services equipped with microscopic facilities, most of which require upgrading.

Currently, malaria control interventions consist mainly of disease management and prevention, training and surveillance.

### III.C. PRIOR AND ONGOING ASSISTANCE

In recent years **WHO** assistance has focused on strengthening the National Malaria Prevention and Control Programme through technical assistance and consultations, international/local training, entomological studies, the provision of antimalarial drugs, laboratory/spraying equipment and supplies, supporting country IEC campaigns, and strengthening malaria surveillance, particularly in border areas with Tajikistan and Afghanistan.

### IV. PROJECT JUSTIFICATION

In face of the re–establishment of malaria transmission in border areas with Tajikistan and the real threat of a resumption of malaria transmission in other areas of the country, the project attempts to change this unfavourable trend, particularly in epidemic–prone border areas with Tajikistan and Afghanistan, where autochthonous cases of *Plasmodium vivax* malaria are reported. Practical, technical and operational modalities on dealing with malaria by specialized services and the public health sector, as well as the community itself, are the expected outcomes of the RBM Project, funded by a number of international agencies/organizations and implemented by the Government of Uzbekistan. The project will have a strong but flexible management structure capable of mobilizing the partnership among the Ministry of Health, UN agencies and other donor agencies and countries, NGOs and the media in implementing cost-effective but technically sound and sustainable malaria control measures adapted to the country's conditions and responding to local needs.

### IV.A. PROBLEMS TO BE ADDRESSED

### Problem I:

There are autochthonous cases of malaria, particularly in border areas with Tajikistan. The availability of efficient malaria vectors and failures to maintain previously effective vector control has resulted in a sudden increase in vectorial capacity and the re–establishment of malaria transmission. Population movements within the country, as well as cross–border migration, including that of infected persons, is one of the reasons for possible outbreaks among vulnerable non-immune people and the re–introduction of malaria into areas which were previously free from this disease.

### **Problem II:**

Shortages of insecticides and limited use of antilarval operations result in a limited impact of vector control operations.

### **Problem III:**

Existing health facilities are under-equipped and under-supplied, resulting in inadequate quality of disease management and prevention. Laboratory facilities are available at central, regional and district levels but most of them are in need to be upgraded.

### **Problem IV:**

There is a lack of malaria surveillance, particularly at the periphery.

#### **Problem V:**

Communities' lack of knowledge and skills to prevent themselves from malaria results in scant use of personal protective measures.

#### **Problem VI:**

Limited resources invested by the Government and WHO result in a lack of proper funding to cope with the malaria problem and its spread throughout the territory of the country.

### IV.B. TARGET LOCATIONS AND INTENDED BENEFICIARIES

During 2002-2005, assistance should be provided for selected districts in Surhandarinskij, Karshinskij, Samarqandskij, Jizakskij, Gulistonskij, Tashkentskij, Andizhanskij, Namanganskij and Ferganskij Regions. In general, the target beneficiaries will be about 3.6 million indigenous people and migrants entering there for various reasons (see *Annex 2*).

### IV.C. SUCCESS IMPACT INDICATORS

A base–line survey conducted in project areas will provide an assessment of the malaria–related problems and needs at the beginning of the project, whereas a terminal evaluation at the conclusion of project will bring to light improvements in the malaria situation which could have occurred as a result of project interventions.

In the short and medium term, the project is likely to reduce the incidence of malaria and prevent a resumption of malaria transmission in areas where it had been eradicated in the past. Sustaining the project's activities beyond 2005 could reduce the impact of malaria to a sufficiently low level so that it no longer represent a public health problem.

### XVII. PROJECT STRATEGY AND PRIORITY INTERVENTIONS

The above will be addressed by actions in specific priority areas, all of which are in line with the following strategic components of the Project and incorporated into the four elements of the National Action Plan for Malaria Control and Prevention

<u>Component I:</u> STRENGTHENING INSTITUTIONAL CAPACITIES OF THE NATIONAL

MALARIA CONTROL PROGRAMME/GENERAL HEALTH SERVICES AND ENHANCING CAPACITY FOR DECISION-MAKING RELATED TO MALARIA AND ITS CONTROL/PREVENTION

To be effective, the national plan of action for malaria prevention and control should be implemented through properly organized and managed specialized and general health services. To facilitate the execution of the RBM project in Uzbekistan, some important aspects in the implementation and management of malaria prevention and control programme, notably responsibility, authority and accountability for work done, resources used and outputs/outcomes produced at all levels should be reviewed. To provide adequate technical and operational guidance in a satisfactory manner, health staff of specialized health services should be trained in programme management. Technical assistance and back—up will be provided by WHO personnel.

### Component II: BUILDING UP RBM PARTNERSHIPS

RBM will address malaria as a priority health issue within the context of sustainable health sector development in Uzbekistan. WHO will provide strategic direction, coordination and technical/financial support for malaria control interventions under RBM. Other partners involved in the RBM Project will mobilize additional funds for RBM interventions.

# Component III: IMPROVING CAPACITIES FOR & ACCESS TO EARLY DIAGNOSIS AND ADEQUATE TREATMENT OF MALARIA

An established and properly functioning system for the identification of cases, reliable and early diagnosis, prompt and effective treatment, and the follow-up of treatment results comprise fundamental parts of the project. Since the microscopic examination remains the most reliable and least expensive way to diagnose malaria, diagnostic laboratory facilities will be upgraded within project areas.

# Component IV: IMPROVING CAPACITIES FOR THE TIMELY RESPONSE TO AND PREVENTION OF MALARIA EPIDEMICS

All epidemic-prone areas will be identified and potential situations forecasted. Emergency preparedness for and mechanisms of response to malaria epidemics will be improved. Contingency plans for epidemic control, including indoor spraying will be worked out, and a reserve of drugs, insecticides and spraying equipment will be maintained for rapid deployment. Basic Health Staff will be trained to recognize epidemic situations and to build up community preparedness.

## Component V: CAPACITY BUILDING

Training is a key component of the project. In–service training in disease management and prevention will be conducted for all categories of specialized programme and public health personnel within project areas. Laboratory personnel will be trained in malaria microscopy. Basic training will be supplemented by regular supervision and refresher training courses. Training will be practical in nature and directed towards developing skills and competence.

### Component VI: REINFORCING RBM COUNTRY SURVEILLANCE MECHANISMS

A base–line survey to assess problems and needs related to malaria will be carried out at the beginning of the project. Mechanisms for the regular collection, processing and analysis of operational, epidemiological and socio-economic data relevant to planning/re-planning, implementation, monitoring and evaluation of the project activities will be built in. The existing reporting and information system will be improved. The survey data will provide a systematic way to determine whether the project approaches and interventions and other inputs are appropriate and sufficient to achieve the stated targets and objectives.

# Component VII: INCREASING COMMUNITY AWARENESS AND PARTICIPATION IN MALARIA CONTROL/PREVENTION

The involvement of communities and their partnership with the formal and informal health sectors to empower them in their own health development is crucial. People should be educated about malaria and its control/prevention and have access to adequate health care facilities. Existing treatment practices will be improved through the development and dissemination of clear messages on malaria and its treatment. Community and family care and preventive practices will be strengthened through the provision of IEC materials, skills-building and traditional/mass media and community support. KAP assessments will conducted on ways to promote compatibility of practices, customs and beliefs of various social groups and minorities with existing malaria control/prevention options, and develop effective IEC strategies and targeted IEC materials.

### Component VIII: STRENGTHENING RESEARCH CAPABILITIES

Operational research is essential for the planning, implementation and evaluation of the project activities, and this will comprise an integral part of the project. Such research will address not only the planning and effectiveness of specific interventions, but also cultural, behavioural, social and economic factors that might effect project interventions and outcomes.

### Component IX: ENHANCING INTERSECTORAL COLLABORATION

Additional resources for malaria control remain severely constrained. The social, economic and environmental problems posed by malaria exceed the jurisdiction and capabilities of the Ministry of Health. There is obviously a need for improved intersectoral collaboration, as well as for planning and information sharing, to see that additional funds are earmarked for malaria control. Such collaboration is best developed from a shared understanding of the underlying problems to be addressed. Information on development activities and the migration of organized and non-organized population groups will be collected and exchanged amongst all parties concerned. The Ministry of Health will stimulate the non-health sectors for active collaboration in malaria control, including mobilization of additional funds. National multi–sectoral committees will promote coordination and collaboration in malaria control among all concerned.

### XVIII. PROJECT OBJECTIVES, ACTIVITIES AND OUTPUTS

### VI.A. DEVELOPMENT OBJECTIVE

The development objective is to reduce the incidence of malaria, prevent malaria outbreaks and its further spread across the country, and minimize socio—economic losses provoked by the disease through the progressive strengthening of capacities and capabilities of health services and mobilizing community actions within the context of the Roll Back Malaria initiative in Uzbekistan.

## VI.B. SPECIFIC OBJECTIVES, ACTIVITIES AND OPERATIONAL OUTPUTS

Specific Objective I:	STRENGTHENED INSTITUTIONAL CAPACITIES OF THE NATIONAL MALARIA CONTROL PROGRAMME/ GENERAL HEALTH SERVICES AND ENHANCED CAPACITY FOR DECISION-MAKING RELATED TO MALARIA AND ITS CONTROL AND PREVENTION					
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST		
14. To render technical and managerial expertise and back-up for the RBM Project	WHO short-term consultants recruited and expert advice given wherever required	2002-2005	WHO	USD 40 000		
15. To train Regional/District Health Directors and Directors of Sanitary and Epidemiological Services in programme management to improve capacities for planning and implementation of the project activities	Regional/District Health Directors and Directors of Sanitary and Epidemiological Services involved in the project trained	2002-2005	MoH/NPS WHO UN Agencies NGOs Others	USD 30 000		
16. To train selected Regional/District Medical Officers in the existing approaches to disease management, epidemic control and community mobilization	Regional/District MOs in project areas trained	2002-2005	MoH/NPS WHO UN agencies NGOs Others	USD 45 000		
6. To support international training selected NPS personnel in malaria and its control as well as entomology	Selected NPS personnel trained abroad	2002-2005	WHO MoH/NPS Others	USD 40 000		
				TOTAL: USD 155 000		

Specific Objective II:	BUILT UP RBM ADVOCACY AND PARTNERSHIP				
ACTIVITIES	OPERATIONAL	TIMEFRAME	POSSIBLE	ESTIMATED	
6. To identify partners and conduct RBM advocacy through workshops and meetings and message development to obtain broad, inter-sectoral commitment at different levels in the country	Partners identified  Targeted RBM advocacy activities conducted among various partners at all levels	2002-2005	WHO UN agencies MoH/NPS NGOs Informal Sector Media Others	USD 20 000	
				TOTAL: USD 20 000	

Specific Objective III:	IMPROVED CAPACI DIAGNOSIS AND RA			_
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
27. To select and train/retrain laboratory staff in malaria microscopy	Laboratory staff trained/re- trained	2002-2005	MoH/NPS WHO UN agencies NGOs Others	USD 45 000
28. To upgrade laboratory facilities in selected health centres	Health facilities upgraded	2002-2005	MoH/NPS WHO NGOs	To be borne by MoH
29. To set up supervision and quality control systems of laboratory services and ensure its functionality	Systems set up and functioning	2002–2005	MoH/NPS WHO NGOs Others	USD 20 000
30. To set up care quality assessments system and ensure its functionality	System set up and functioning	2002–2005	MoH/NPS WHO NGOs Others	USD 20 000
31. To develop/modify/produce training/learning materials on disease management and prevention	Materials developed and produced	2002-2005	MoH/NPS WHO UN agencies NGOs Others	USD 40 000
32. To train basic health staff in case management	BHS trained	2002–2005	MoH/NPS WHO UN agencies NGOs Others	USD 45 000
33. To procure and distribute laboratory equipment/supplies and drugs/other items required for disease management	Equipment and supplies procured and distributed	2002-2005	WHO UN agencies NGOs Others	USD 120 000
				TOTAL: USD 290 000

Specific Objective IV:		IMPROVED CAPACITIES FOR THE TIMELY RESPONSE TO AND PREVENTION OF MALARIA OUTBREAKS			
ACTIVITIES	OPERATIONAL	TIMEFRAME	POSSIBLE	ESTIMATED	
40 7 1 1	OUTPUTS	0000 0000	PARTNERS	COST	
13. To develop monitoring mechanisms for the detection/forecasting of epidemic risk factors	Monitoring mechanisms developed	2002-2003	WHO MoH/NPS	To be covered by WHO Consultant	
14. To update NPS operational guidelines and procedures related to detection and control of epidemics	Operational guidelines and procedures updated	2002-2003	MoH/NPS WHO	To be borne by MoH	
15. To improve emergency preparedness for and response to malaria epidemics in project areas where outbreaks are a recurring problem	Emergency preparedness for and response to malaria outbreaks improved	2002–2005	MoH/NPS WHO	To be borne by MoH	
16. To procure and deliver insecticides and equipment for spraying	Insecticides and equipment for spraying procured and distributed	2002–2005	WHO UN Agencies Others	USD 400 000	
17. To apply indoor residual spraying in cases of emergency	Residual spraying applied	2002-2005	MoH/NPS	To be borne by MoH	
18. To train health personnel in epidemic control	Health personnel trained	2002–2005	MoH/NPS WHO UN agencies NGOs Others	USD 45 000	
				TOTAL: USD 445 000	

Specific Objective V:	STRENGTHENED RBM COUNTRY SURVEILLANCE MECHANISMS				
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST	
27. To design and carry out a base– line survey to assess needs and problems related to malaria and impact assessment survey	A base–line survey and impact surveys carried out	2002-2005	MoH/NPS WHO	USD 10 000	
28. To identify operational and epidemiological indicators needed for monitoring/evaluation of project activities	Operational and epidemiological indicators identified	2002	MoH/NPS WHO	To be covered by WHO Consultant	
29. To train personnel of NPDCSs in data collection, processing and analysis	Personnel of NPDCSs trained	2002–2005	MoH/NPS WHO UN agencies NGOs Others	USD 30 000	
30. To establish and maintain the project operational and epidemiological database	Operational and epidemiological database established and maintained	2002–2005	MoH/NPS WHO	To be borne by MoH	
31. To improve the existing reporting and information systems	Reporting and information systems improved	2002–2005	MoH/NPS WHO	To be borne by MoH	
32. To procure project transportation, equipment and supplies to improve supervision and monitoring of project activities at all levels	Transportation, equipment and supplies procured	2002–2005	WHO UN Agencies Others	USD 25 000	
33. To undertake monitoring of project activities	Monitoring undertaken	2002-2005	MoH/NPS WHO NGOs	USD 40 000	
				TOTAL: USD 105 000	

Specific Objective VI:	INCREASED COMMUNITY AWARENESS AND PARTICIPATION IN MALARIA CONTROL AND PREVENTION					
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST		
13. To strengthen community and family care and prevention practices through providing IEC materials, awareness raising sessions, community support, skills building and mass media	Malaria care and prevention practices strengthened	2002–2005	MoH/NPS UN agencies WHO NGOs Community Others	USD 100 000		
14. Rapid assessments on practices of recognition and treatment of malaria and personal protection will be conducted in order to develop effective IEC strategy	KAP study designed and conducted	2002	MoH/NPS UN agencies WHO NGOs Community	USD 5 000		
15. To build IEC service capacities, including development of targeted IEC materials and IEC management and monitoring	Targeted IEC materials developed; IEC campaign implemented and monitored	2002-2005	MoH/NPS UN agencies WHO NGOs Media Others	USD 80 000		
				TOTAL: USD 185 000		

Specific Objective VII:	STRENGTHENED CAPABILITIES FOR OPERATIONAL RESEARCH					
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST		
To design research protocols, carry out studies and prepare final reports	Protocols designed, studies conducted and final reports prepared	2002	MoH/NMCP WHO ECHO NGOs Research Institutions Others	USD 30 000  TOTAL: USD 30 000		

Specific Objective VIII:	ENHANCED INTERSECTORAL COLLABORATION			
ACTIVITIES	OPERATIONAL OUTPUTS	TIMEFRAME	POSSIBLE PARTNERS	ESTIMATED COST
17. To set up a National Multi– Sectoral Committee and ensure its functionality	National Multi–Sectoral Committee established and functioning	2002-2005	MoH/NMCP GOs WHO	To be borne by the Government
18. To define situations where collaboration is needed and establish mechanisms to promote collaboration within project areas	Situations defined and mechanisms established	2002–2005	MoH/NMCP GOs	To be borne by the Government
19. To coordinate the exchange of information about all development activities relevant to malaria within the project areas	An effective system of communication on malaria between health and non-health sectors established and exchange of information coordinated	2002–2005	MoH/NMCP GOs	To be borne by the Government
20. To identify and mobilize additional resources required for malaria control from non-health sectors	Additional resources identified and mobilized	2002-2005	MoH/NMCP GOs	To be borne by the Government

### XIX. PROJECT MANAGEMENT AND TIMEFRAME

The project will be implemented by the Ministry of Health, National Parasitic Diseases Control Service with technical and financial support from WHO and potential donors and partners. The project management structure is as outlined below:

At the central level: The National Parasitic Diseases Control Service will be responsible for the implementation of project activities. The Director of NPDCS/ Project Manager will work in close consultation with the Ministry of Health. Personnel of PDCS will undertake field visits to supervise the performance of work carried out in the field. WHO consultants will be recruited to assist in the planning and evaluation of the project activities. The implementation of some project activities, such as upgrading laboratory facilities, training, health education, community—based activities and other interventions, will be sub—contracted to international NGOs.

At the regional/district levels: Focal points for the project (Chiefs of Regional/District PDCS) will be designated for better communication and coordination between the central and district levels. Staff of Regional/District PDCSs and general health service will be responsible for the entire project—related activities in their respective areas. Technical advice will be provided by regional/district specialized health personnel dealing with malaria issues.

WHO will provide overall technical backstopping and strategic coordination of project activities with UN agencies/NGOs and others concerned. The project will be implemented in full consultation with all agencies and organizations involved in order to enhance coordination and maximize the impact of assistance. The project is planned for a period of four years (2002-2005).

### VIII. PROJECT MONITORING AND EVALUATION

Monitoring and evaluation will be a critical and continuous process of reviewing the project progress, problems and constraints, with the sole purpose of identifying the required areas of action for enhanced effectiveness of the project. Comprehensive monitoring and evaluation will be carried out by the National Implementing Agency, in collaboration with WHO/EURO, at regular intervals. An impact assessment survey will be carried out at the conclusion of the project. Monitoring and evaluation will be based on the participation of all the stakeholders.

WHO/EURO will provide technical clearance of the Project Document before the start of the project. Project management will prepare a project implementation plan over the first month of the start the project. The project will be subject to annual reviews and reporting. The final draft of the project will be prepared in advance to allow for review and technical clearance by WHO. Project management will be responsible for the preparation and submission of evaluation reports. Specific monitoring and evaluation methods, schedules and indicators will be developed for the project at the start of the project (see *Annex 3*)

### IX. RISKS

The RBM Project in Uzbekistan is a new initiative. The implementation of the RBM strategy could entail some risk. The implementation and management of the Project should be reviewed periodically to ensure the Project remains on track.

A continuous flow of inputs from different UN agencies and other donors is critical to the success of the RBM Project in Uzbekistan. There is some risk that the funding agencies would not be able to provide and/or sustain the level of inputs required to see a visible project impact. The inadequacy of funds would limit the scope of project activities.

## X. PROJECT BUDGET

The total project budget is estimated at <u>USD 1 302 000</u>, funds which would be contributed by the Government, WHO and other partners/donors (see <u>Table below</u>). The Government will cover operational costs of the existing specialized and public health staff to be involved in implementation of project activities.

Table: The estimated project budget for 2002-2005

	2002	2003	2004	2005
DESCRIPTION	USD	USD	USD	USD
Technical Expertise: International experts Duty travel	10 000 15 000	10 000 15 000	10 000 15 000	10 000 15 000
Sub-Total:	25 000	25 000	25 000	25 000
Equipment - Expendable: Drugs and laboratory supplies Insecticides/equipment for indoor spraying	10 000 100 000	10 000 100 000	10 000 100 000	10 000 100 000
Equipment - Non-Expendable: Laboratory equipment Transportation Office equipment/supplies	20 000 5 000 5 000	20 000 5 000 -	20 000 5 000 5 000	20 000
Sub-Total:	140 000	135 000	140 000	130 000
Quality Assessments/Assurance:	5 000 5 000	5 000 5 000	5 000 5 000	5 000 5 000
Problems & Needs Assessments	5 000	-	-	-
KAP Study/ IEC Service Capacity Development	25 000	20 000	20 000	20 000
RBM Advocacy & Partnership Building	5 000	5 000	5 000	5 000
Impact Assessment	-	-	-	5 000
Training: In-Service Training: Development & production of training/learning materials Central and intermediate levels training	20 000 25 000	10 000 20 000	10 000 20 000	- 10 000
Peripheral level training for public health personnel	45 000	40 000	40 000	40 000
International Training: Training in malaria and its control	10 000	10 000	10 000	10 000
Operational Research	10 000	10 000	10 000	-
Community Capacity Building	25 000	25 000	25 000	25 000
Monitoring/Evaluation	10 000	10 000	10 000	10 000
Miscellaneous: Operation & maintenance Sundries	2 000 1 000	2 000 1 000	2 000 1 000	2 000 1 000
TOTAL	358 000	323 000	328 000	293 000

### **ANNEXES**

Annex 1: Malaria situation in Uzbekistan, 1995-2000

	1995	1996	1997	1998	1999	2000
Autochthonous malaria	0	0	0	0	7	46
Imported cases	27	51	52	74	78	80
Plasmodium vivax	25	49	52	74	82	125
Plasmodium falciparum	2	0	0	-	3	1
Mixed infections	0	2	0	-	0	0
Total number of malaria cases	27	51	52	74	85	126

## Annex 2: RBM project areas in Uzbekistan, 2002-2005

- Selected districts in Surhandarinskij Region
- Selected districts in Karshinskij Region
- Selected districts in Samarqandskij Region
- Selected districts in Jizakskij Region
- Selected districts in Gulistonskij Region
- Selected districts in Tashkentskij Region
- Selected districts in Andizhanskij Region
- Selected districts in Namanganskij Region
- Selected districts in Ferganskij Region

The target project beneficiaries will be about 5.6 million indigenous people and migrants.

## Annex 3: Monitoring and evaluation indicators

Ou	tput (process) indicators:
_	Percentage of project districts having adequate amount of learning and IEC materials
	Percentage of project districts with adequately trained health staff
	Percentage of project districts with adequate provision of equipment, drugs, insecticides and other supplies
	Percentage of project districts under regular supervision of malaria diagnosis and treatment/laboratory services
	Percentage of project districts/population under surveillance
Ou	tcome indicators:
	Percentage of project districts where epidemic control operations, with emphasis on indoor residual spraying, have been correctly applied and all active foci are covered by the above–mentioned interventions
	Percentage of project districts where more than 75 % of patients are being diagnosed/treated correctly
	Percentage of project districts where more than 75 % of the care providers use updated knowledge and built–up skills in diagnosis and treatment/management of malaria
	Percentage of project districts where more than 75 % of households, families and mothers are aware of symptoms/diagnosis/treatment/referral and are capable of providing appropriate self–diagnosis
lm	pact indicators (to estimate the effect of large-scale interventions within project areas):
	As a result of improved coverage and quality of epidemic control measures:  A decrease in the incidence of P. vivax malaria  Prevention of malaria outbreaks  Prevention of re-establishment of transmission of P. vivax malaria
	As a result of improved coverage and quality of diagnosis and radical treatment of P. vivax: Prevention of relapses of P. vivax malaria