

Ministry of
Education, Science and
Technology



Ministry of
Health

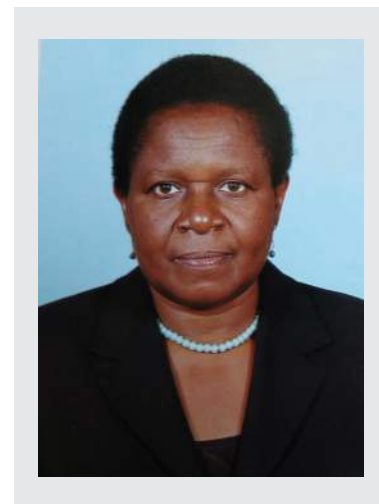
Kenya National School-Based Deworming Programme Year 1 (2012-2013) Results



Message from the Ministry of Education, Science and Technology

The Government of Kenya is committed to achieving the Millennium Development Goals (MDGs) and Education for All by 2015. Attainment of Universal Primary Education depends wholly on the attention we give to the health of the school-age children.

Diseases do not only affect learning negatively, but may lead to disability or loss of life. Healthy children develop into productive future citizens. Schools should therefore take great measures to prevent diseases through health education and implementation of preventive interventions. This will go a long way in poverty eradication, improved health of the citizens and thus help to realize the MDGs and other national and international goals.



Ensuring that children are healthy and able to learn is critical to the effectiveness and efficiency of any education system. Healthy children are able to attend school regularly and hence stabilize attendance and enhance performance. Improved health allows for better physical and cognitive development in children which eventually produces a more productive population.

Sound education promotes acquisition of knowledge, good attitudes, and practices necessary for healthy living, disease prevention, and control. Our school curriculum emphasizes skill-based health education and promotion with a focus on safe water, environmental sanitation, and hygiene for worm control.

The National School-Based Deworming Programme aims to eradicate parasitic worms as a public health problem in Kenya, as well as promoting good health and hygiene practices among school-age children. The Ministry of Education, Science and Technology – State Department of Education will continue to collaborate with other state departments and development partners in supporting school health programmes in order to achieve quality education.

Remarks by Mrs. Margaret Okemo, Director Basic Education, State Department of Education, Ministry of Education, Science and Technology

Message from the Ministry of Health

School-age children make up 42% of the total population. They suffer varying but significant degrees of ill health resulting to nutrition deficiencies and mortality that unequivocally impede effective learning and realization of their full productive potential. The ill health is partly due to poor sanitation, unsafe drinking water, factors related to lack of hygiene, parasitic infections, macro- and micronutrient deficiencies, HIV infections and other sexually transmitted infections.

Schistosomiasis and Soil Transmitted Helminthes (STHs) infections affect children more than other populations. These infections give rise to much suffering and death; in addition, they contribute to the perpetuation of poverty by impairing the cognitive performance, growth of children, reduced work capacity and productivity potential when adults.

Approximately 16.6 million people are at risk of STH infection in Kenya, with 7 million children affected. About 6 million people are estimated to be at risk of Schistosomiasis infection in Kenya with about 70% being between the ages 5-14 years.

The STHs (*Ascaris lumbricoides*, *Trichuris trichiura* and hookworms) are estimated to infect over 1 billion individuals worldwide. In 2010, 5.18 million disability adjusted life years (DALYs) were lost as a consequence of STH infections and schistosomiasis contributed to loss of 3.31 million DALYs. Chronic infections can have insidious effects on childhood development, including growth and cognitive development. Both chronic (anaemia, malnutrition, and intestinal obstruction) and high intensity infections are most common in school-age children who are the natural targets for school-based deworming programmes.

In 2001, the World Health Assembly endorsed the WHA 54.19 resolution that urged countries to control morbidity due to STH infection through regular deworming of school-aged children, setting a target to deworm 75% of the school children.

The National School-Based Deworming Programme was launched by Ministry of Health (MoH) and Ministry of Education, Science and Technology (MoEST) in 2009 to control STH and Schistosomiasis. About 3.6 million school age children from 8,218 primary schools in 45 districts were dewormed using Albendazole.

This programme was modelled on the previous pilot programmes in Kenya, including a Programme in Mwea District in central Kenya supported by the Eastern and Southern Africa Centre of International Parasite Control (ESACIPAC) and the Japan International Cooperation Agency (JICA).

The Ministries of Health and Education, Science and Technology, together with other line ministries and development partners have put in place a policy framework to reduce the disease burden emanating from infestation of worms among children in and out of school.

Five million children of 2-14 years of age are targeted by the National School-Based Deworming Programme annually. Due to the collaborative effort between the Ministries of Health and Education, Science and Technology, school-age children in 112 sub-counties, have successfully been dewormed in Nyanza, Western, Rift Valley and Coast Regions.

The Ministry of Health provides leadership and quality public health and sanitation whereas the Ministry of Education coordinates resource mobilization to support the Programme.

I would like to take this opportunity to thank the Children's Investment Fund Foundation for providing funds to support the Programme, Deworm the World Initiative for technical and administrative support, and GlaxoSmithKline and Merck Serono, through the World Health Organization, for providing deworming drugs. The two ministries (MoH and MoEST) will continue to provide leadership, human resource, provision of deworming drugs and logistics management.

Finally, I wish to thank all partners, community and schools for their continued support for the National School-Based Deworming Programme.

"KwaAfya Na Elimu Bora TuangamizeMinyoo!"



Dr. Shahnaz Kassam Sharif, MBS, MMed, MSc, Director of Public Health, Ministry of Health

A young girl with short dark hair, wearing a light blue school uniform over a white collared shirt, is smiling and holding a small white pill between her fingers. The background is a blurred outdoor setting with trees and a building.

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List of Abbreviations

| | |
|-------|--|
| CDE | County Director of Education |
| CHC | County Health Coordinator |
| DEO | District Education Officer |
| DMOH | District Medical Officer of Health |
| DtWI | Deworm the World Initiative |
| ECD | Early Childhood Development |
| KEMRI | Kenya Medical Research Institute |
| KEMSA | Kenya Medical Supplies Agency |
| MoEST | Ministry of Education, Science, and Technology |
| MoH | Ministry of Health |
| NSBDP | National School-Based Deworming Programme |
| WHO | World Health Organization |

Overview of the National School-Based Deworming Programme

The Government of Kenya recognizes that the health and education of Kenya's children drives the country's future. It is also committed to the Country's developmental blueprint, Vision 2030, which aims to provide high quality life to all citizens by year 2030, and Millennium Development Goal 2: Achieve universal primary education. Therefore, through the National School-Based Deworming Programme (NSBDP), the Government seeks to improve the health and education status of its children and secure Kenya's future.

In Kenya, worms affect an estimated 5 million school-aged children. Due to the negative impact of these worms on children's health and education, the Government of Kenya launched the NSBDP in 2009, wherein 3.6 million children were dewormed. The Programme's objective is to eradicate parasitic worms as a public health problem in Kenya and aims to treat at least 5 million Kenyan children each year for at least five years (2012-2016) in all areas that meet the World Health Organization (WHO) prevalence threshold for mass drug administration.

The NSBDP is implemented by the Ministry of Education, Science, and Technology (MoEST) in collaboration with the Ministry of Health (MoH) with technical assistance from Deworm the World Initiative (DtWI). Personnel from MoEST and MoH play a joint leadership role in ensuring that the Programme is implemented in every public and private primary school within the targeted treatment area, with the goal of treating every child aged 2-14 years whether they are enrolled or not enrolled in school.

District-level officers from both ministries implement the Programme in their areas with supervision from County leadership. District and Division personnel are responsible for key elements of the programme's success, including facilitating teacher trainings, distributing tablets to schools, managing community sensitization activities, and monitoring the deworming treatment. Trained teachers provide free treatment to all enrolled, non-enrolled and Early Childhood Development (ECD)-aged children.

The WHO has confirmed that deworming tablets can be safely administered by teachers with support from the local health system. All teachers that participate in the NSBDP are trained and supervised by local health personnel, with oversight from District and Division health and education personnel, to administer treatment to children in order to benefit their overall health and educational outcomes.

In Kenya, worms affect an estimated 5 million school-aged children.



Why School-Based Deworming?

The NSBDP is a national scale-up program based on rigorous evidence that has proven that deworming has a significant impact on children's health and education.

The Problem:

What are Worms?

Worms, or *minyoo* in Swahili, are parasites that live in the human intestines and bladder. There are two types of worms treated by the NSBDP: soil-transmitted helminthes (STH or common worms) and schistosomiasis (bilharzia). Worm infection is a chronic condition that threatens children's health and limits their access to education. Worms can cause anemia and malnutrition, and thereby impair children's mental and physical development. Children infected with worms can become too sick or tired to concentrate at school, or to even attend school at all.

The Solution:

Why Deworming?

Because worms negatively affect children's health and education, deworming children helps them grow and stay healthy and also improves their educational attainment. The benefits of deworming are immediate, long lasting and have a wide reach. Deworming positively impacts the children who receive treatment, as well as their siblings and other children who live nearby.


Why School-Based Deworming?

School-aged children typically have the highest intensity of worm infection of any age group, and because they are growing, they are the most at risk. School-based deworming reaches children where they are – at school. Schools offer a readily available, extensive and sustained infrastructure that makes the programme cost-effective. Additionally, schools are equipped with a skilled workforce that is in close contact with the community.

Evidence of Impact:

How Does School-Based Deworming Benefit Children?

Results from rigorous, long-term studies conducted in Kenya evaluating school-based deworming demonstrate the long-lasting benefits of deworming. Deworming children reduces school absenteeism by 25% and increases literacy (children persistently infected with worms are 13% less likely to be literate when they are adults). Due to spillover effects, deworming also dramatically improves cognition in untreated younger siblings that is equivalent to half a year of schooling. Additionally, adults who are dewormed as children earn wages over 20% higher than their untreated counterparts.

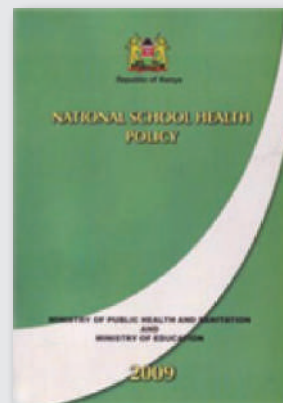


Worms can be transmitted by walking or playing barefoot in contaminated soil or water.

NSBDP Policy Framework

The NSBDP is embedded in several existing policies adopted by the Government of Kenya. These policies ensure its alignment with GoK priorities and infrastructure that ensure the sustainability of the programme.

The *National School Health Policy and Guidelines*, which was adopted by the Ministry of Education, Science and Technology and the Ministry of Health in 2009 defines school-based mass deworming as an effective preventive and treatment measure against worms. The policy states, **“Treatment shall be administered to all school-age children, including those out of school, based on the prevalence and intensity of worms and bilharzias in the area.”** (pg. 32)



The *National-Multi-Year Strategic Plan for the Control of Neglected Tropical Diseases, 2011-2015* was launched in 2011, and lays the basis for a comprehensive strategy for the integration of neglected tropical disease control efforts. In this Strategic Plan, school-based deworming is identified as one of the treatment strategies for the control of worms and bilharzia.



The NSBDP is one of the initiatives under the *National School Health Programme* at the Ministries of Health and Education, which is an integrated set of planned, school-based strategies, activities, and services to promote the health and educational development of pupils and the health of the community.



Implementing the National School

The National School-Based Deworming Programme uses a cascade implementation model that efficiently and effectively utilizes resources from the National level to schools.

At the National level, the Programme engages and trains personnel from MoEST, MoH and KEMRI as Master Trainers and monitoring tools. Thereafter, an initial stakeholders' meeting is held with County and District leadership. This is followed by County and Teacher Trainings. Embedded at each training level are key community sensitization messages targeted at the community. Implementation occurs – Deworming Day – where teachers administer deworming treatment to millions of children. Unused drugs are then moved up through a “Reverse Cascade” as described below.

The Cascade model helps to manage the National scale of the NSBDP, and therefore, builds capacity for successful implementation and leadership responsibilities for the planning, implementation and monitoring of Programme activities at all levels. The



County Meetings

Before any implementation takes place within each County, personnel from the County, including the County Health Coordinator (CHC) jointly convene a County Meeting, facilitated by the National Programme team, where County and District leadership discuss managerial roles. This is a critical meeting, as the Programme gains buy-in and builds partnerships by engaging County and District leadership in planning & supportive supervision to Districts, monitoring Teacher Training Sessions and Deworming Day, and acting as a point of contact (CHC) in case of any media inquiries. Key participants of this meeting include District Education Officers (DEOs) and District Health Officers (DHOs) of the Programme.



District Training

Master Trainers are deployed to train District and Division personnel from both Ministries on how to train teachers and community health workers together to finalize the list of schools to be treated and determine the amount of drugs needed for each school. Joint responsibilities include: managing individual budgets for Teacher Training and Deworming Day, preparing for Deworming Day, and managing the return of monitoring forms and remaining drugs through the District. DMOHs are responsible for ensuring schools' attendance at Teacher Trainings, while DMOHs are responsible for picking up deworming drugs from the District and delivering them to each school during Teacher Training, overseeing community-level sensitization activities and ensuring that



Teacher Training

Trained Division-level personnel train primary school Head and Health teachers, with oversight from the District. Teachers are responsible for sensitizing the community and preparing for treatment before DD, administering treatment and filling monitoring forms. **NOTE:** Immediately following Teacher Trainings, community-level health workers, alongside teachers, share the message with village elders, and community-based organizations prior to treatment and encourage community members to



Deworming Day

On a designated Deworming Day, teachers administer deworming treatment to children in schools within the District. Tablets are given to all children aged 2-14 who are enrolled in Primary Schools, in nearby Early Childhood Development Centres, or in a nearby school. MoH personnel visit schools to monitor treatment to ensure proper administration and to manage any side effects. Both MoEST and MoH personnel are responsible for ensuring children are being dewormed and monitoring forms are filled properly. Both MoEST and MoH personnel are



Reverse Cascade

After Deworming Day, schools send their monitoring forms to their Division-level Area Education Officer (AEO). The AEO is responsible for sharing the data with the DMOH and County personnel, and returning the forms, along with any remaining drugs, to the Division Public Health Office for management. Any remaining drugs at the school are collected by the AEO and then given to the Division Public Health Office. The form is then given to the DMOH who is responsible for sharing the data with the National Office for data analysis and financial management. The DMOH is also responsible for ensuring critical for the calculation of the number of children treated and ultimately, the success of the Programme.

Tool-Based Deworming Programme

and cost-effectively delivers trainings, deworming drugs, monitoring forms, funds, and other program materials and

trainers, requisitions drugs through the MoH, and develop treatment and implementation strategies, training materials meeting is followed by two levels of trainings on how to successfully implement the Deworming Programme: District building community awareness of the importance and benefits of child deworming. After training, the critical day of in over 10,000 schools across Kenya and fill in monitoring forms capturing the treatment. These forms and any

Successful implementation. Additionally, the Cascade brings together MoEST and MoH personnel through collaborative efforts. The Cascade is outlined in the infographic below.

County Director of Education (CDE), County Director of Teacher Management, and County Health Officer and District-level personnel are sensitized about the Programme and made aware of their roles in working with the newly created County-level structure. County-level responsibilities include: providing technical support to performing County-level community sensitization, and serving as the Programme's spokesperson to County Councils and District Medical Officers of Health (DMOHs), who play critical leadership roles in implementing the Programme.

After treatment, monitoring forms are returned to the National Office and unused drugs distributed to health facilities.

Teachers to implement a successful Deworming Day. During the training, DMOHs and DEOs work together to develop a plan for the day based on enrollment figures. Personnel also learn about their key responsibilities for Programme Day, coordinating Teacher Trainings, ensuring that all schools are participating and are adequately stocked with tablets, and implementing the Reverse Cascade. DEOs are also responsible for receiving and distributing all training materials and tablets from their regional Kenya Medical Supplies Agency (KEMSA) depot, managing their distribution and ensuring that any tablets remaining after Deworming Day are taken to health facilities.

strict level, on their key roles for implementing a successful Deworming Day (DD). These include: filling forms during DD, and returning forms to the National team and remaining drugs to MoH after DD. Disseminating the community sensitization messages with key influential community members, including parents, and encouraging them to participate, particularly non-enrolled children..

programme coverage areas and fill in monitoring forms to record the number of children dewormed. Development (ECD) Centres, and those from the surrounding community who are not enrolled in any serious adverse events should they arise. MoEST personnel are responsible for ensuring that all available during Deworming Day to provide necessary support to teachers.

), who then compiles Division-level data and sends it to their DEO for District-level compiling. The DEO works with financial accountability documentation, to the National Office for data analysis and financial accountability. The District Health Officer who then fills a form that calculates the number of unused tablets and distributes the data with the DEO and County personnel, and returning the form, along with financial accountability documentation, is responsible for managing the drug redistribution to the health facilities. The Reverse Cascade process is

Reverse Cascade

Year 1 Programme Coverage



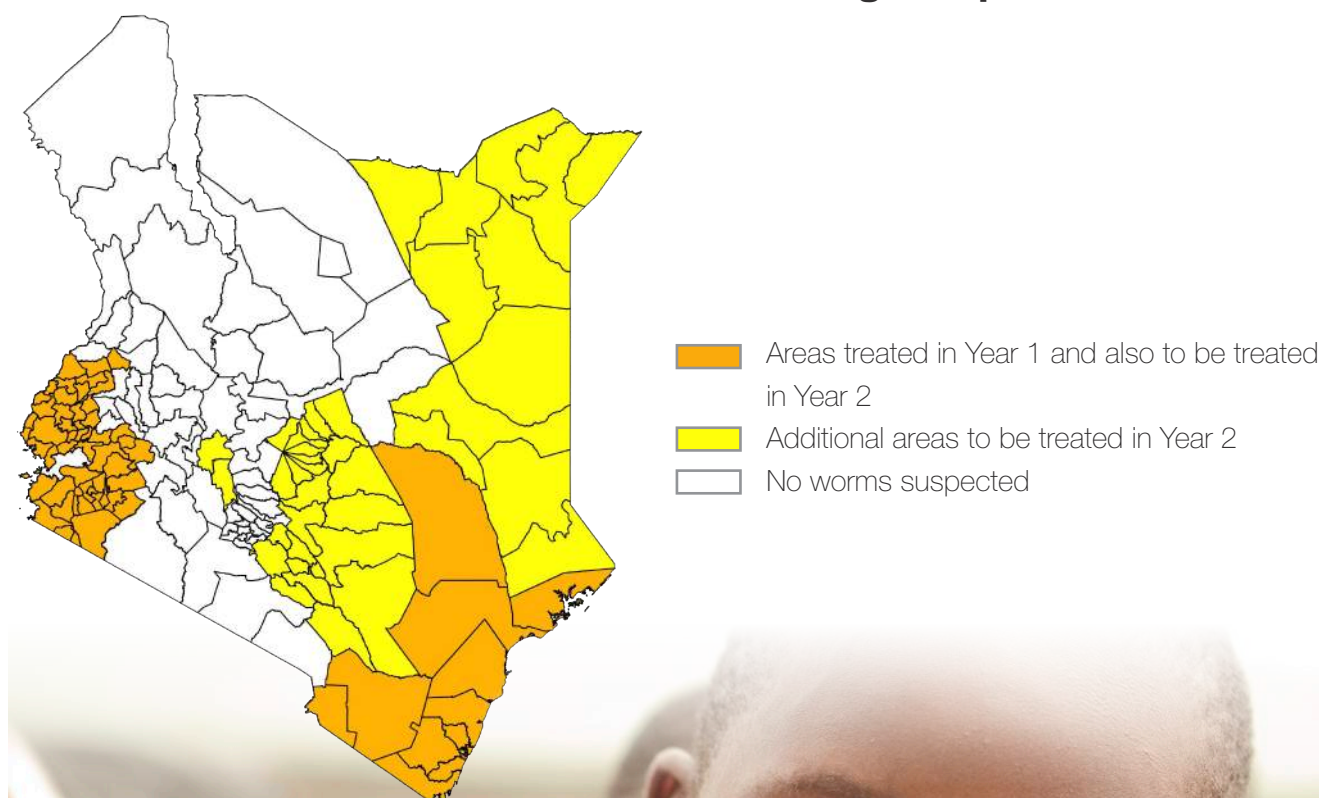
The Kenya Medical Research Institute (KEMRI) is the national body responsible for carrying out health research in Kenya and is an extremely important and effective institutional partner of the NSBDP. With a number of renowned international experts in STH, schistosomiasis, mapping, and parasitology, the team at KEMRI provides both technical and operational support for the Programme.

Worms are a problem in many regions of Kenya. In 2009, scientists from KEMRI determined that the prevalence and intensity of worm infection in districts in Western, Nyanza, Coast and parts of Rift Valley Regions justified treating every child in identified areas through a mass treatment programme for children. These districts are shown in dark orange in the map below, which identifies the targeted treatment areas for Year 1.

In 2012, KEMRI conducted a baseline survey for monitoring and evaluation in these districts in order to capture specific district data on worm infection prevalence before treatment. This data would be later used to analyze the effect of deworming after treatment in Year 1 (results of the survey and post treatment data is detailed on the next page).

Areas shown in yellow represent areas of Programme expansion where focal areas of schistosomiasis may be present and will be treated in Year 2. Implementation will take place in these regions where necessary in subsequent treatment rounds. Areas shown below in white do not require mass treatment.

National Treatment Coverage Map



Assessing Worm Burden in Kenya Before and After Deworming Treatment

Worm Burden Before Year 1 Treatment

From January to April 2012, the Ministry of Health, through the Eastern and Southern Africa Center of International Parasite Control (ESACIPAC) of KEMRI conducted a baseline survey in 200 schools within 20 Districts in Coast, Western, Nyanza and Rift Valley regions to establish an accurate national measurement of the magnitude of parasitic worm infection levels in school-age children. The team from KEMRI collected and analyzed samples of stool and urine (only in Coast districts where *Schistosoma haematobium* is widespread) from 21,528 children to determine soil-transmitted helminthes (STH) and schistosomiasis (bilharzia) prevalence.

Overall, 33% of all children were infected with at least one type of STH. Overall prevalence of schistosomiasis was 4% while in the Coast where urine was collected, prevalence was 11%.

The recently published results from this survey provided an accurate and up-to-date assessment of the burden of worm infection in the regions of Kenya targeted for school-based deworming, validated the need for mass drug distribution, and provided a rigorous basis for evaluating Programme impact.

Worm Burden After Year 1 Treatment

After the initial baseline survey, KEMRI continued the monitoring and evaluation of the NSBDP to inform the Government on the effectiveness of the treatment for worms. Between September and October 2012, the team conducted a pre-post survey in order to monitor 60 of the 200 schools in the baseline study before and immediately after treatment (NOTE: as of September 2013, only 45 out of 60 schools have been evaluated for schistosomiasis – analysis of post treatment data for the 15 remaining schools in Coast is currently ongoing). This survey's purpose was to evaluate the efficacy of treatment for STH and schistosomiasis by measuring reduction in worm prevalence.

After deworming, the results indicate a 73% reduction in prevalence of all types of STH in the observed districts. In the 45 schools assessed for schistosomiasis, initial data indicates there was a 29% reduction in prevalence. These results from the pre-post survey demonstrate a widespread reduction of prevalence of STH and schistosomiasis amongst a majority of the observed districts, which demonstrates the efficacy of deworming treatment. The table below details the prevalence of STH and schistosomiasis before and after deworming for the observed districts.

¹Mwandawiro et al. Parasites & Vectors 2013, 6:19 Monitoring and evaluating the impact of national school-based deworming in Kenya: study design and baseline result. <http://www.parasitesandvectors.com/content/pdf/1756-3305-6-198.pdf>

²Not statistically significant

| PREVALENCE OF STH & SCHISTOSOMIASIS: PRE and POST DEWORMING TREATMENT | | | | | |
|---|----------------------------|---------------|----------------|-----------------|--|
| REGION | DISTRICT | STH | | SCHISTOSOMIASIS | |
| | | Pre Treatment | Post Treatment | Pre Treatment | Post Treatment |
| COAST | Kilindini | 20% | 12% | 0% | Analysis of post treatment data currently ongoing. |
| | Kwale | 26% | 8% | 18% | |
| | Malindi | 33% | 3% | 19% | |
| | Msambweni | 37% | 11% | 17% | |
| | Taita | 3% | 1% | 0% | |
| | OVERALL COAST | 23% | 7% | 11% | |
| NYANZA | Gucha | 47% | 5% | 0% | 0% |
| | Homa Bay | 31% | 9% | 5% | 1% |
| | Kisumu East | 18% | 2% | 2% | 2% |
| | Masaba | 40% | 1% | 1% | 0% |
| | Rachuonyo | 32% | 19% | 0% | 1% |
| | Kuria East | 22% | 3% | 0% | 0% |
| | OVERALL NYANZA | 32% | 7% | 1% | 1% |
| RIFT VALLEY | Bomet | 32% | 6% | 0% | 0% |
| | Kericho | 32% | 7% | 0% | 0% |
| | Trans Mara | 54% | 24% | 0% | 0% |
| | OVERALL RIFT VALLEY | 39% | 12% | 0% | 0% |
| WESTERN | Bungoma East | 43% | 2% | 0% | 0% |
| | Bunyala | 27% | 15% | 26% | 18% |
| | Busia | 36% | 13% | 0% | 2% |
| | Emuhaya | 55% | 19% | 0% | 0% |
| | Kakamega Central | 50% | 10% | 0% | 0% |
| | Lugari | 36% | 2% | 0% | 0% |
| | OVERALL WESTERN | 41% | 11% | 4% | 3% |
| TOTAL SUMMARY | | 33% | 9% | 4% | To be completed |

Year 1 National Programme Results



REPUBLIC OF KENYA

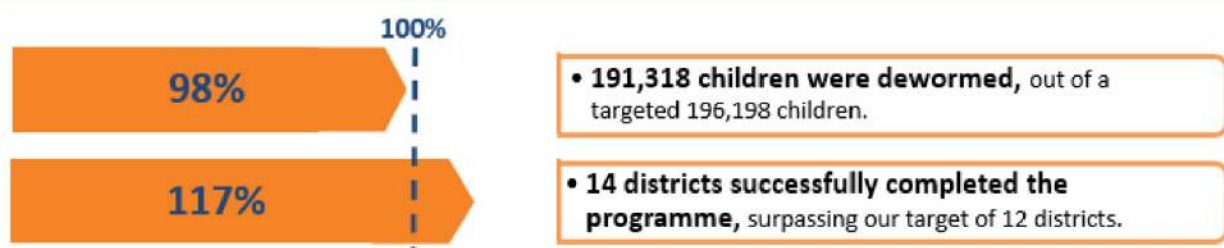
NATIONAL SCHOOL-BASED DEWORMING PROGRAMME

2012-2013 National Treatment Results

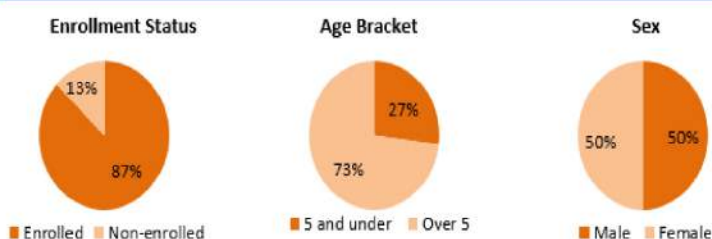
Programme Coverage Summary for Soil-Transmitted Helminthes (STH) Treatment



Programme Coverage Summary for Schistosomiasis Treatment



STH Treatment Analysis



Schistosomiasis Treatment Analysis



National Deworming Facts at a Glance

| Statistic | STH | Schisto | Statistic | STH | Schisto |
|--------------------------------|-----------|---------|--|-----------|---------|
| Districts completed | 112 | 14 | Children 5 and under dewormed | 1,605,391 | n/a |
| Schools participated | 13,414 | 355 | Children over 5 dewormed | 4,352,675 | 191,318 |
| Children dewormed | 5,958,066 | 191,318 | Master Trainers trained | 59 | 25 |
| Male children dewormed | 2,982,591 | 96,216 | Est. district/division MoE personnel trained | 1,437 | 154 |
| Female children dewormed | 2,975,475 | 95,102 | Est. district/division MoPHS personnel trained | 1,437 | 154 |
| Enrolled children dewormed | 5,193,573 | 176,578 | Completed teacher training sessions | 828 | 51 |
| Non-enrolled children dewormed | 764,493 | 14,740 | Est. number of teachers trained | 28,248 | 710 |

In partnership with:



Year 1 National Programme Results: District Breakdown

National School-Based Deworming Programme 2012-2013 District Breakdown of STH and Schistosomiasis Treatment

| County | District Name | Children Dewormed (STH) | Children Dewormed (Schisto) | Deworming Date | County | District Name | Children Dewormed (STH) | Children Dewormed (Schisto) | Deworming Date | |
|-----------|----------------------------|-------------------------|-----------------------------|----------------|--------------|---|-------------------------|---|----------------|-----------|
| Bomet | Bomet | 100,832 | See Kakamega Central* | 31-Oct-12 | Kisumu | Kisumu East | 25,588 | 32,652 | 30-Jul-12 | |
| | Chepalungu | 61,997 | | 10-Oct-12 | | Kisumu North/ Municipality | 114,584 | | 31-Jul-12 | |
| | Konoin | 53,585 | | 16-Oct-12 | | Kisumu West | 54,145 | | 01-Aug-12 | |
| | Sotik | 79,392 | | 25-Oct-12 | | Muhoroni | 46,022 | | 07-Aug-12 | |
| Bungoma | Bumula | 76,934 | | 11-Jul-12 | | Nyakach | 55,704 | | 01-Aug-12 | |
| | Bungoma Central | 61,320 | | 11-Jul-12 | | Nyando | 29,954 | | 01-Aug-12 | |
| | Bungoma East | 91,986 | | 24-Jul-12 | | Kwale | Kinango | | 80,927 | 29-Jan-13 |
| | Bungoma North | 88,314 | | 10-Jul-12 | | | Kwale | | 51,897 | 30-Jan-13 |
| | Bungoma South | 80,727 | | 10-Jul-12 | Msambweni | | 90,128 | 30-Jan-13 | | |
| | Bungoma West | 40,034 | | 11-Jul-12 | Lamu | Lamu East | 6,196 | 05-Feb-13 | | |
| | Cheptais | 47,391 | | 19-Jul-12 | | Lamu West | 28,708 | 05-Feb-13 | | |
| | Kimilili Bungoma | 53,593 | | 06-Jul-12 | Migori | Awendo | 39,495 | 13-Feb-13 | | |
| Mt Elgon | 34,531 | 11-Jul-12 | | Kuria East | | 35,685 | 13-Feb-13 | | | |
| Busia | Bunyala | 24,643 | | 11-Jul-12 | | Kuria West | 66,453 | 14-Feb-13 | | |
| | Busia | 49,634 | | 12-Jul-12 | | Migori | 94,869 | 23-Oct-12 | | |
| | Butula | 50,951 | | 13-Jul-12 | | Nyatike | 61,872 | 25-Oct-12 | | |
| | Nambale | 38,354 | | 10-Jul-12 | | Rongo | 40,361 | 19-Feb-13 | | |
| | Samia | 37,014 | | 10-Jul-12 | | Uriri | 48,491 | 23-Oct-12 | | |
| | Teso North | 45,804 | | 23-Jul-12 | | Mombasa | Changamwe | 40,055 | 13-Feb-13 | |
| | Teso South | 58,559 | | 10-Jul-12 | Kisauni | | 66,237 | 12-Feb-13 | | |
| Homa Bay | Homa Bay | 87,895 | | 12-Oct-12 | Likoni | | 33,981 | 07-Feb-13 | | |
| | Mbita | 40,186 | | 12-Oct-12 | Mvita | | 31,145 | 12-Feb-13 | | |
| | Ndhiwa | 78,741 | | 12-Oct-12 | Nandi | Nandi East | 46,427 | 24-Oct-12 | | |
| | Rachuonyo North | 55,900 | | 10-Oct-12 | | Nandi South | 62,390 | 30-Jul-12 | | |
| Kakamega | Rachuonyo South | 81,984 | | 10-Oct-12 | Tinderet | 36,447 | 01-Aug-12 | | | |
| | Suba | 45,893 | | 10-Oct-12 | Narok | Trans Mara East | 47,861 | 22-Oct-12 | | |
| | Butere | 53,887 | | 25-Jul-12 | | Trans Mara West | 70,301 | 10-Oct-12 | | |
| | Kakamega Central (Lurambi) | 101,889 | | 27-Jul-12 | Nyamira | Borabu | 28,563 | 24-Oct-12 | | |
| | Kakamega East (Shinyalu) | 60,183 | | 04-Jul-12 | | Manga | 32,541 | 10-Oct-12 | | |
| | Kakamega North (Malava) | 87,110 | | 27-Jun-12 | | Masaba North | 39,772 | 11-Oct-12 | | |
| | Kakamega South (Ikolomani) | 41,600 | | 04-Jul-12 | | Nyamira North | 54,233 | 14-Feb-13 | | |
| | Khwisero | 38,553 | | 24-Jul-12 | Siaya | Nyamira South | 49,067 | 19-Oct-12 | | |
| | Likuyani | 51,086 | | 24-Jul-12 | | Bondo | 47,582 | 01-Aug-12 | | |
| | Lugari | 46,025 | | 31-Jul-12 | | Gem | 56,510 | 31-Jul-12 | | |
| | Matete | 32,353 | | 18-Jul-12 | | Rarieda | 53,522 | 31-Jul-12 | | |
| | Matungu | 59,715 | | 20-Jun-12 | | Siaya | 69,406 | 01-Aug-12 | | |
| | Mumias | 83,595 | | 20-Jun-12 | | Ugenya | 33,400 | 01-Aug-12 | | |
| Navakholo | See Kakamega Central* | | | | | Ugunja | 33,032 | 30-Jul-12 | | |
| Kericho | Belgut | 79,201 | | 16-Oct-12 | Taita Taveta | Mwatate | 21,635 | 12-Feb-13 | | |
| | Buret | 66,029 | | 25-Oct-12 | | Taita | 11,291 | 08-Feb-13 | | |
| | Kericho | 60,099 | | 16-Oct-12 | | Taveta | 22,509 | 10,491 | 28-Jan-13 | |
| | Kipkelion | 55,001 | | 17-Oct-12 | Tana River | Voi | 25,646 | 13-Feb-13 | | |
| | Londiani | 5,133 | | 31-Jul-12 | | Tana Delta | 17,061 | 14-Feb-13 | | |
| Kilifi | Ganze | 59,652 | 9,838 | 31-Jan-13 | | Trans Nzoia | Tana North | 17,438 | 7,528 | 29-Jan-13 |
| | Kaloleni | 59,401 | 14,203 | 26-Oct-12 | Tana River | | 21,363 | 6,554 | 29-Jan-13 | |
| | Kilifi | 105,513 | 7,219 | 31-Jan-13 | Kwanza | | 94,979 | 24-Oct-12 | | |
| | Magarini | 60,404 | 13,622 | 30-Jan-13 | Vihiga | Trans Nzoia East | 75,540 | 26-Jul-12 | | |
| | Malindi | 69,235 | 4,680 | 29-Jan-13 | | Trans Nzoia West | 148,065 | 24-Oct-12 | | |
| Rabai | 32,293 | 3,909 | 25-Oct-12 | Emuhaya | | 65,109 | 20-Jul-12 | | | |
| Kirinyaga | Mwea East | 21,871 | 19,337 | 07-Feb-13 | | Hamisi | 60,536 | 24-Jul-12 | | |
| | Mwea West | 26,731 | 25,132 | 07-Feb-13 | Sabatia | 48,659 | 20-Jul-12 | | | |
| Kisii | Gucha | 30,882 | | 11-Oct-12 | Total | Districts Dewormed 112 (STH) 14 (Schisto) | | Children Dewormed 5,958,066 (STH) 191,318 (Schisto) | | |
| | Gucha South | 67,378 | | 11-Oct-12 | | | | | | |
| | Kenyenya | 54,374 | | 09-Oct-12 | | | | | | |
| | Kisii Central | 94,877 | | 24-Oct-12 | | | | | | |
| | Kisii South | 33,633 | | 15-Oct-12 | | | | | | |
| | Marani | 43,618 | | 30-Oct-12 | | | | | | |
| | Masaba South | 44,261 | | 10-Oct-12 | | | | | | |
| | Nyamache | 52,224 | | 09-Oct-12 | | | | | | |
| Sameta | 24,325 | 18-Oct-12 | | | | | | | | |

* In the first year of the deworming programme, Navakholo District was treated as part of Kakamega Central.



Programme Partners

The Kenya National School-Based Deworming Programme is implemented with the support and technical assistance of several partner organizations.

The Deworm the World Initiative (DtWI) exemplifies Evidence Action's focus on scaling proven development interventions and crafting sustainable models for successful implementation. The initiative aims to launch, strengthen and sustain national, government led school-based deworming programmes globally. By building capacity within governments to enable their management and financing of deworming programmes, DtWI is helping governments maximize impact of treatment to improve the health, education, and future earning of children. To date, DtWI currently reaches more than 43 million children in 27 countries. DtWI is proud to be working with the Government of Kenya on the expansion of the National School-Based Deworming Programme. The Programme was first launched in 2009 with DtWI's technical assistance wherein 3.6 million children were dewormed. The NSBDP currently reaches more than 5 million Kenyan children annually. For more information about DtWI and the National School-Based Deworming Programme, please visit www.dewormtheworld.org.

Evidence
Action

Deworm the
World Initiative



Innovations for Poverty Action (IPA) is a non-profit organization dedicated to discovering and promoting effective solutions to global poverty problems. Established in 2002, IPA partners with researchers at top universities and implementing organizations around the world to ensure that poverty-fighting activities are supported by rigorous evaluation, and we work closely with local decisionmakers in key countries to ensure that the high-quality evidence is applied at scale. IPA has completed more than 100 studies, and we have more than 200 in progress around the world, covering education, health, agriculture, financial services, governance, water and sanitation, and post-conflict recovery. Within a decade, IPA has grown to over 900 staff working on building and promoting evidence in 51 countries. For more information, visit www.poverty-action.org.

The Children's Investment Fund Foundation (CIFF) is an independent, non-profit, philanthropic organisation. Founded in 2003, CIFF aims to demonstrably improve the lives of children living in poverty in developing countries through high impact, large-scale and sustainable interventions. CIFF is an engaged funder and stays engaged throughout each programme, making changes where necessary to achieve best outcomes. The current focus of the Foundation is in the three areas of child survival, educational achievement and hunger alleviation and nutrition. CIFF is prioritising its investments in five thematic areas: neonatal mortality, PMTCT, severe and acute malnutrition, early learning (pre-primary through grade 2), and deworming. CIFF invests primarily in sub-Saharan Africa and India around a highly focused portfolio of programmes, targeting explicit intervention areas where the Foundation assesses it can deliver high return for children. CIFF funds partners which it views as having high potential to achieve large scale, measurable outcomes and sustainable change, and who are committed to engaging with CIFF to use data to continually assess progress and adapt as necessary to increase impact. For more information about CIFF, please visit www.CIFF.org.



The END Fund's mission is to reduce the prevalence of Neglected Tropical Diseases (NTDs) among the world's poorest and most vulnerable people. We accomplish this by: (1) mobilizing and directing resources to where they can have maximum impact; (2) advocating for innovative, integrated and cost-effective NTD programs; and (3) encouraging private sector engagement. The END Fund's strategic programming and priorities are in line with the global NTD community's common roadmap to control or eliminate the highest burden NTDs by 2020. The END Fund has a special emphasis on sub-Saharan Africa and currently supports NTD programs in nine countries in this region. For more information about END Fund, please visit www.END.org.

KENYA NATIONAL SCHOOL-BASED DEWORMING PROGRAMME



KWA AFYA NA ELIMU BORA



TUANGAMIZE MINYOO