

Date: July 21, 2003



From: WHO Collaborating Center for Research, Training and Eradication of Dracunculiasis

Subject: GUINEA WORM WRAP-UP #134

To: Addressees

Are This Year's Interventions Better Than Last Year's? If So, How?

EDITORIAL: DETECT EVERY CASE AND CONTAIN TRANSMISSION FROM EVERY GUINEA WORM

This message is intended to bring to the attention of all national Guinea Worm Eradication Programs (GWEPs) that past difficulties in implementing effective case containment has been due to the lack of awareness and attention to the need to ensure there is synchrony between the frequency of village – based surveillance (active searches for cases) and the very first requirement (standard) for containing transmission from individuals with Guinea worm disease (GWD), i.e., detection of those individuals before or within 24 hours of the emergence of the Guinea worm. Detection of every case within 24 hours of worm emergence requires daily surveillance for cases of the disease in every known endemic village. Notwithstanding, the current practice is, as far as we know, for village-based surveillance to be conducted once per week at minimum. We are also aware that in some countries surveillance at this very moment is less frequent than once per week.

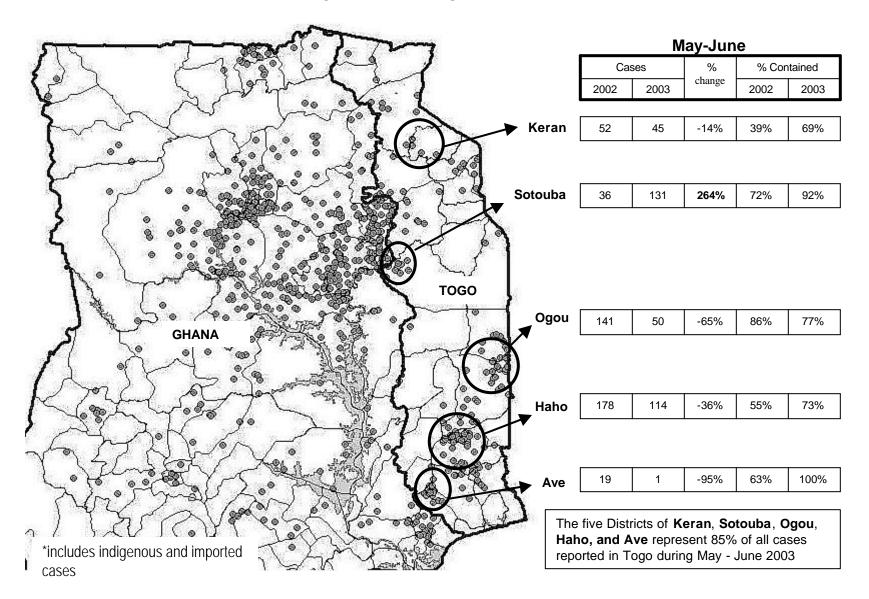
At this stage of the global campaign all GWEPs should now be ensuring that village-based surveillance for cases of the disease is proactive and carried out <u>daily</u>. To do this GWEPs need to also ensure there is enough manpower in each endemic village so it can be searched for cases daily. In Ghana, for example, the Ghana Red Cross Society has deployed 810 women (a village club) to help the designated GWEP village volunteer do surveillance and help contain cases more effectively. Where they exist, Village Health Committees or village Guinea Worm Committees can also become a source of additional manpower in endemic villages to achieve synchrony between surveillance for cases in segments of their endemic village. The ability of national GWEPs to stop transmission of GWD hinges on quickly increasing the tempo of all interventions, but particularly the early detection of every person with GWD so that transmission of the disease from these individuals can be effectively prevented. The frequency (and quality) of supervision must also be in synchrony with these operational requirements. Onwards!

TOGO: PROGRESS IN THE SOUTH, INCREASED CASES IN THE NORTH

Haho (664 cases), Ogou (251 cases), Sotouba (202), and Keran (118) Districts reported over 80% of all dracunculiasis cases in Togo in 2002 (see map). These four districts also comprise a similar share of the country's cases so far in 2003. Whereas the two southern districts have reduced their cases by -46% in January-June 2003, however, the two northern districts' cases have increased by 65% (Figure 1). The increased cases in Sotouba are related to the outbreak in the village of Djarapanga in July 2002, and are focused among ethnic Konkombas who share a border with members of the same highly affected ethnic

Togo Guinea Worm Eradication Program

Villages reporting 1+ cases in 2002*



group in Ghana's Northern Region. Togolese and Ghanaian Guinea worm workers in the two border areas are meeting monthly. Sotouba District will implement a Worm Week during the week beginning July 21, and Keran opened a case containment center the week before that. Haho conducted a Worm Week during the week beginning June 23rd, with the help of 15 U.S. Peace Corps Volunteers, in 41 villages. Two theater groups performed 20 theater sketches, and the nation program coordinator, <u>Mr. K. Ignace Amegbo</u>, and the lead technical assistant provided by The Carter Center/Global 2000, <u>Mr. Jim Ting</u>, were interviewed on local radio. All endemic villages in the four districts are reported to have cloth filters in all households. Support from WHO is being used to conduct trainings for health workers in Guinea worm-free zones, to improve surveillance.

Is your program using up-dated line-listings and maps to forecast cases and monitor interventions?

GHANA: 76% OF CASES OUTSIDE OF SUDAN; ENGAGING KONKOMBAS

With its 78% increase in cases so far this year (from 2,708 cases in January-May 2002 to 4,825 cases in the same period of 2003), largely due to better active surveillance, Ghana has reported 78% of all cases outside of Sudan so far this year (the next highest endemic country, Nigeria, now has only 17% of cases outside of Sudan). This program continues to intensify interventions. It conducted one Worm Week in 2001, ten in 2002, and will conduct at least 16 in 2003 (nine have been done already). The 14 case containment centers begun at the end of 2002 will increase to 21 before this year's peak transmission season begins in October. The Ghana Red Cross Society's Women's Clubs initiative, which began in 2002, is expanding from the top 6 endemic districts and over 4,000 volunteers to about 6,200 volunteers covering endemic villages in the top 15 affected districts. Technical assistance provided by external consultants supported by The Carter Center rose from 38 person-months in 2001, to 44 in 2002, and is projected to reach 56 person-months in 2003, in addition to a rising proportion of Ghanaian technical assistants. The Carter Center will also provide 280,000 pipe filters to be distributed to villages at risk in the top 7 endemic districts before the next peak transmission season. The Government of Ghana has committed to provide 180 wells in priority endemic villages before the end of 2003.

As part of its outreach to ethnic Konkombas, who are recently recognized as being at high risk for contracting the disease, a Konkomba zonal consultant in Nanumba District, <u>Mr. Dokurugu Yidana</u>, held three closed meetings with Konkomba opinion leaders in his district to discuss prevention of dracunculiasis. These were favorably received, and one result has been Konkomba community sanctions against patients entering sources of drinking water. Eight of the eleven area coordinators for the Guinea Worm Eradication Program in the Northern Region's Nanumba, Soboba-Chereponi and Zabzugu-Tatale Districts are Konkomba. A 40-minute video that was filmed in the Konkomba language is being shown extensively in problem areas of Nanumba and Nkwanta Districts. Of the 673 cases reported in Nanumba District in January-May 2003, 212 (32%) were isolated in a case containment center. The district chief executive of Brong-Ahafo Region's Atebubu District, <u>Mr. Cassius Osei-Poku</u>, visited the five most difficult and highly endemic communities in his district (Fawomang, Kunkunde, Sullemana, Bachaso, Nwomwam) in May. He informed each of the respective chiefs that they would be held responsible for occurrences of Guinea worm disease in their communities. Zabzugu-Tatale District, which was the highest endemic district in Ghana in 2002, reduced its cases by -63% in May and June 2003, compared to the same two months of

Figure 1

Distribution of 7,110 Cases of Dracunculiasis Reported Outside of Sudan: January - June 2003*

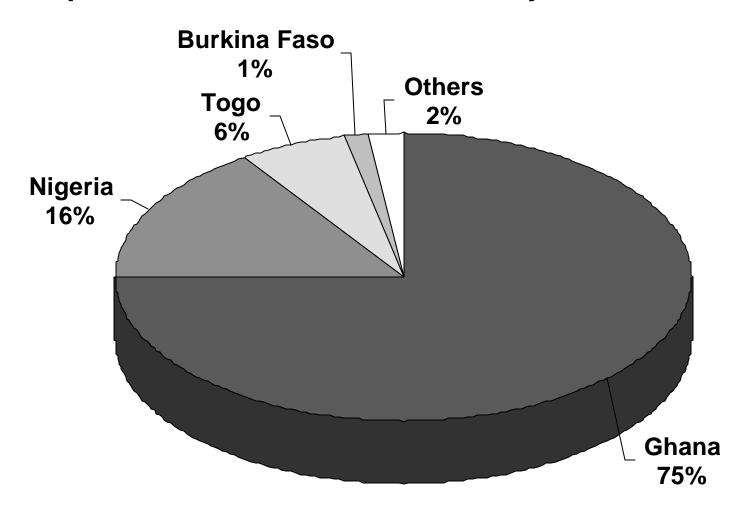


Table 1

Number of cases contained and number reported by month during 2003*

COUNTRIES REPORTING CASES		NUMBER OF CASES CONTAINED / NUMBER OF CASES REPORTED														
	JANUARY	FEBRUARY	MARCH	APRIL	MAY	JUNE	JULY	AUGUST	SEPTEMBER	OCTOBER	NOVEMBER	DECEMBER	TOTAL*	CONT.		
SUDAN	708 / 1176	362 / 702	543 / 870	490 / 1095	450 / 1325	/	7	7	1	/	/	7	2553 / 5168	49		
GHANA	470 / 870	741 / 1322	510 / 931	602 / 936	498 / 767	335 / 512	/	/	/	7	7	/	3156 / 5338	59		
NIGERIA	389 / 568	179 / 245	103 / 125	53 / 61	30 / 52	49 / 58	/	/	/	7	/	/	803 / 1109	72		
TOGO	109 / 147	36 / 50	22 / 30	37 / 42	77 / 87	53 / 70	7	/	/	/	7	/	334 / 426	78		
MALI	3 / 3	4 / 4	5 / 5	2 / 3	3 / 3	7 / 8	7	/	7	/	7	/	24 / 26	92		
BURKINA FASO	6 / 6	3 / 4	0 / 2	1 / 3	12 / 17	24 / 64	7	/	7	/	7	/	46 / 96	48		
NIGER	0 / 0	1 / 1	0 / 0	2 / 2	0 / 0	6 / 6	7	/	7	/	7	/	9 / 9	100		
COTE D'IVOIRE	7 / 21	5 / 8	1 / 2	1 / 3	4 / 4	1 / 1	7	/	7	/	7	/	19 / 39	49		
BENIN	21 21	1 / 1	1 / 1	0 / 0	0 / 0	0 / 0	7	/	7	/	7	/	23 / 23	100		
ETHIOPIA	0 / 0	0 / 0	3 / 3	7 / 7	7 / 7		7	/	7	/	7	/	22 / 22	100		
MAURITANIA			0 / 0	0 / 0	0 / 0	2 / 2	7	/	7	/	7	/	2 / 2	0		
UGANDA				3 / 3	9 / 11	5 / 6	7	7	7	1	7	7	17 / 20	85		
TOTAL*	1713 / 2812	1332 / 2337	1188 / 1969	1198 / 2155	1090 / 2273	487 / ₇₃₂	0 / 0	0 / 0	0 / 0	0 / 0	0 / 0	0 / 0	7008 / 12278	57		
% CONTAINED	61	57	60	56	48	67							57			

(Countries arranged in descending order of cases in 2002)

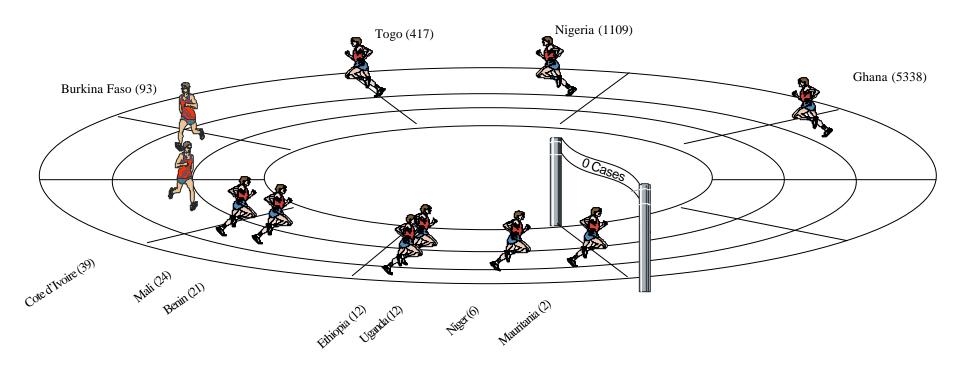
* PROVISIONAL

Shaded cells denote months when zero indigenous cases were reported. Numbers indicate how many imported cases were reported and contained that month.

For other imported cases see table of imported cases by month and by country.

Figure 2

GUINEA WORM RACE OUTSIDE OF SUDAN IN 2003*



*Provisional data, January - June 2003, Indigenous cases

Figure 3

Number of Villages/Localities Reporting Cases of Dracunculiasis in 2002, Percentage of Endemic Villages Reporting in 2003*, Number of Indigenous Cases Reported During the Specified Period in 2002 and 2003*, and Percent Change in Cases Reported

	Villa	iges	Indigenous Cases													
Country	Reporting	% Reporting	Repo	% CHANGE 2002 - 2003												
	1+ cases in 2002	2003	2002	2003	-100% -	-80%	-60%	-40%	-20%	0%	20%	40%	60%	80%	100%	120%
Cote d'Ivoire (6)	25	50%	188	39	-79%											
Burkina Faso (6)	133	85%	257	93		-64%										
Niger (6)	77	100%	13	6			54%									
Benin (6)	31	100%	45	21			53%									
Sudan (5)	4233	64%	10422	5168			-50%									
Nigeria (6)	557	100%	1996	1109			-44%	6								
Mauritania (6)	18	100%	3	2				-33%	_							
Mali (6)	183	NR	31	24				-23	%							
Togo (6)	228	100%	519	417				-2	0%							
Ethiopia (6)	12	100%	15	12				-2	0%							
Ghana (6)	739	87%	3115	5338										71%		
Uganda (6)	19	100%	6	12											10	0%
Total	6255	73%	16610	12241				-26%	0							
Total- Sudan	2022	92%	6188	7073							14%					

(6) Indicates month for which reports were received, i.e., Jan. - June, 2003

* Provisional

Has your program conducted "Worm Weeks" in all of the highest endemic districts this

IN BRIEF:

Nigeria reported only 58 cases of dracunculiasis in June (-82%), which was its third straight month with fewer than 100 cases. This latest sharp reduction is doubly important since Nigeria's mid-year peak transmission season, in the north of the country, used to begin in June. Southeast Zone, the highest endemic zone in the country, reported ZERO cases in June for the first time! Congratulations Nigeria!! Borno State opened its first two containment centers in June, to facilitate case containment, with 3 more centers to come. Gombe State is pioneering an alternative "case confinement" strategy, in which Guinea worm patients are placed under 24-hour watch to ensure the affected person does not contaminate a water source.

Sudan Of the estimated 700,000 Sudanese in camps for Internally-Displaced Persons throughout Sudan, over 234,000 have been educated about dracunculiasis prevention so far this year, in preparation for a peace agreement when many will return to their homes. The eight northern states that still have cases reported 1 indigenous case and 2 cases imported from southern Sudan in January-May 2003 (all cases were contained), compared to 3 indigenous and 2 imported cases for the same period of 2002 (3 of the 5 were contained).

Niger Local Nigerien supervisors and village-based health workers joined with U.S. Peace Corps Volunteers and Japanese Overseas Cooperation Volunteers to conduct the first Worm Week ever in Tillabery District on May 915, and a repeat Worm Week in Tera District on May 23-29. In Tillabery District, the teams used 19 endemic localities as their base, to reach about 4,500 people and distribute about 3,500 filters. In Tera District, ten teams visited a total of 54 localities, reached about 4,000 people and distributed over 3,000 filters. The Worm Week in Tillabery was funded by The Carter Center, that in Tera by UNICEF. This program is also reaching out to nomadic Touareg populations in these key districts by means of a flipchart tour with special animation at night, and popular local musical groups.

Benin has now reported ZERO cases for four consecutive months (March-June) for the first time ever!

Ethiopia and **Uganda** are both being hindered from stopping transmission of dracunculiasis because of insecurity in the remaining endemic areas. Ethiopia has reported 12 indigenous cases (all in Gambella Region) and 10 cases imported from Sudan (all in South Omo Region) in the first six months of 2003. Uganda has reported 12 indigenous cases (all in one village, Nawuapoet, in Kotido District) and 8 cases imported from Sudan into refugee camps in several districts so far this year. In response to an emergency appeal from Uganda's Guinea Worm Eradication Program, UNICEF has provided two new borehole wells near the country's sole endemic village (Nawuapoet).

GUINEA WORM WARRIORS EARN FELLOWSHIP AT EMORY UNIVERSITY

In 2002 The Bill & Melinda Gates Foundation established the William H. Foege Fellowships in Global

Health to honor the career and achievements of one of the world's leading figures in public health. Supported by a \$5 million endowment, the new fellowship program is housed in the Rollins School of Public Health at Emory University, Atlanta, Georgia, where <u>Dr. William Foege</u> holds an appointment as Presidential Distinguished Professor.

It is a special honor that **h**e first class, consisting of four students, includes <u>Mr. Ayman Elsheikh</u>, of Sudan's Guinea Worm Eradication Program (GWEP) and <u>Alhaji Sadi Moussa</u>, of Niger's GWEP. They were chosen for their leadership in the campaign to eradicate Guinea worm disease and for their commitment to public health. Congratulations Ayman and Sadi!!!

Are radio messages in local languages being broadcast to populations in the highest endemic areas? If so, how often?

DEFINITIONS AND RECOMMENDED INDICATORS FROM THE 47TH MEETING OF THE INTERAGENCY GROUP FOR DRACUNCULIASIS ERADICATION (Held on May 14-15, 2003 at WHO headquarters, Geneva, Switzerland):

Performance indicators:

There are various indicators to reflect the degree of success in applying surveillance and interventions in Guinea worm programs. The definitions of those indicators are not the same in all endemic countries. The need to have standard definitions for those indicators was felt necessary in order that data can be comparable within and between countries. Because not only endemic villages are under surveillance, it was recommended to keep "endemic village" as an indicator for villages with indigenous transmission and to develop other sets of indicators for other villages such as non-endemic villages that are under surveillance.

Summary of definitions:

A case of guinea worm: An individual exhibiting a skin lesion or lesions with emergence of one or more Guinea worms (each individual should be counted only once in a calendar year).

Imported case: A case of Guinea worm disease that was acquired in a place other than the village where it was detected and reported.

Endemic village: A village with one or more active indigenous cases during the previous and/or current calendar year.

Reinfected village: A previously endemic village that reported indigenous cases after at least one calendar year of zero reporting and where interventions need to be reinstated.

New endemic village: A village that appeared on the list of endemic villages for the first time since records were kept, where intervention and surveillance activities need to be initiated.

At risk village: A village is considered as at risk of local transmission of GW if at least two of the following risk factors are associated:

_ Absence of safe drinking water and near endemic villages.

- _ Shared unsafe source of drinking water with neighboring endemic village.
- _ Established degree of links/movement of population with endemic villages/areas.

Village under surveillance:

In endemic villages: Active surveillance, Village Based Volunteer (VBV) visits household regularly all year round and at least weekly; monthly reporting and monthly supervision. (VBV is active in surveillance and intervention in endemic villages.)

In formerly endemic villages were there is continuous risk of transmission, surveillance should be more proactive during the peak transmission season on a country-by-country basis.

Definition of reporting indicator: Percentage of endemic villages reporting monthly.

Footnotes:

- a- All reports should be accurate and complete
- b- Reports should be received on time (as set by the program).
- c- Scrutiny of reports to ensure that the most highly endemic villages always report promptly and regularly every month.

Definition: Percentage of endemic villages where there are village-based workers/village volunteers (VBW/VVs) who have been trained/retrained in the previous calendar year.

Footnotes: VBW/VV is:

- a- Functioning
- b- frequently and appropriately trained or retrained in the last calendar year.
- c- regularly supervised
- d- given incentives.
- e- covering manageable fraction of population (households) and catchment area.

Definition: Percentage of endemic villages provided with specific monthly health education interventions.

Footnotes: The health education is provided through any one of the following:

- a- Theatre
- b- Radio/Video
- c- Discussion face-to-face
- d- Worm week
- e- CWEPs should track the cumulative coverage (so far this year) of endemic villages benefiting from these health education interventions and include those in their monthly updates.

Definition: Percentage of endemic villages where all households, as defined by the national GWEP, have filters.

Footnotes:

a- Adequate coverage

- b- Availability of filters before the transmission season
- c- Spot check of usage
- d- Demonstrate correct usage and care.
- e- Leave adequate stock of filters in the village.

Definition: Percentage of endemic villages with access to one or more functioning safe source of drinking water.

Footnotes:

- a- The source of water should be functional and satisfy the drinking water needs all year round including during the transmission season.
- b- Programs should advocate for priority to the most highly endemic communities and those with water supply that are in disrepair.
- c- Assure an adequate number of functioning sources for endemic villages, according to their population

Definition: Percentage of endemic villages this month where all eligible ponds were treated with ABATE[®] larvicide.

Footnote:

In determining the eligibility of ponds for Abate treatment consideration should be given to size, seasonality and location.

Containment Cases

Definition of case containment

A case of Guinea worm disease is contained if <u>all</u> of the following conditions are met:

- 1. The patient is detected before or within 24 hours of worm emergence; and
- 2. The patient has not entered any water source since the worm emerged; and
- 3. The village volunteer has <u>properly managed</u> the case, by cleaning and bandaging until the worm is fully removed, and by giving health education to discourage the patient from contaminating any water source (if two or more emerging worms are present, the case is not contained until the last worm is pulled out); and
- 4. The containment process, including verification that it is a case of Guinea worm disease, is <u>validated by a supervisor</u> with 7 days of the emergence of the Guinea worm.

MEETINGS



The Fifth Meeting of the International Commission for the Certification of Dracunculiasis Eradication will be held at WHO headquarters in Geneva, Switzerland on March 9-11, 2004.

Burkina Faso has graciously agreed to host the next meeting to review the status of Guinea Worm Eradication Programs in French-speaking countries of West Africa in Ouagadougou, during October 20-22, 2003.

Inclusion of information in the Guinea Worm Wrap-Up does not constitute "publication" of that information. In memory of BOB KAISER.

For information about the GW Wrap-Up, contact Dr. James H. Maguire, Director, WHO Collaborating Center for Research, Training, and Eradication of Dracunculiasis, NCID, Centers for Disease Control and Prevention, F-22, 4770 Buford Highway, NE, Atlanta, GA 30341-3724, U.S.A. FAX: 770-488-7761. The GW Wrap-Up web location has changed to <u>http://www.cdc.gov/ncidod/dpd/parasites/guineaworm/default.htm</u>



CDC is the WHO Collaborating Center for Research, Training, and Eradication of Dracunculiasis.