DREF operation final report

International Federation of Red Cross and Red Crescent Societies

Uganda: Hepatitis E Virus (HEV)

DREF operation n° MDRUG009

19 January 2009

The International Federation's Disaster Relief Emergency Fund (DREF) is a source of un-earmarked money created by the Federation in 1985 to ensure that immediate financial support is available for Red Cross Red Crescent response to emergencies. The DREF is a vital part of the International Federation's disaster response system and increases the ability of national societies to respond to disasters.

Summary: CHF 173,059 (USD 154,793 or EUR 104,884) was allocated from the Federation's Disaster Relief Emergency Fund (DREF) to support the Uganda Red Cross Society (URCS) in delivering immediate assistance to the populations affected by the outbreak of Hepatitis E virus (HEV). A total of CHF 4,813 was returned to DREF, hence URCS was working with an income of CHF 168,246.

This operation was implemented over 3 months starting on 3 March 2008 and ended on the 3 June 2008. During this period over 5,761 HEV cases were confirmed.

A total of 96 deaths were recorded, giving a Case Fatality Rate (CFR) of 1.5 percent. About 80 percent were pregnant women and most deaths occurred as a result of late reporting to health facilities. Door to door sensitization was conducted by trained volunteers and Local Councils in the main camps of Agoro, Potika A and Potika B, as well as return sites of Oboko, Lupulingi, Lugede, Ywaya and Apwoyo. Camp clean up was done twice a week (every Wednesdays and Saturdays). Latrines and hand washing facilities were also provided to the community members. Community based volunteers (Village Health Teams) and Local Council Chairmen were trained in Participatory Hygiene and Sanitation Transformation (PHAST) methodology and communication skills and undertook social mobilization. Monitoring visits were conducted by the Branch Governing Board members including official hand over of latrines and opening and closing of volunteers' trainings. Joint inter-agency monitoring and/or supervisory visits headed by the Resident District Commissioner were conducted in all the 13 affected sub-counties.

This operation was conducted in collaboration with the Ugandan Government Ministry of Health (MoH), the United Nations Children's Fund (UNICEF) and the World Health Organization (WHO). Médecins sans Frontières (MSF) and the Associazione Volontari per il Servizio Internazionale – (**Association of Volunteers in International Service – AVSI)** also collaborated at different capacities.

Due to the ongoing epidemic, an Emergency Appeal (MDRUG010) was launched on 10 July 2008 and activities to control the spread of the disease were carried out.

Bucket chlorination at the water points by community volunteers.

<click here for the final financial report or here to view contact details>

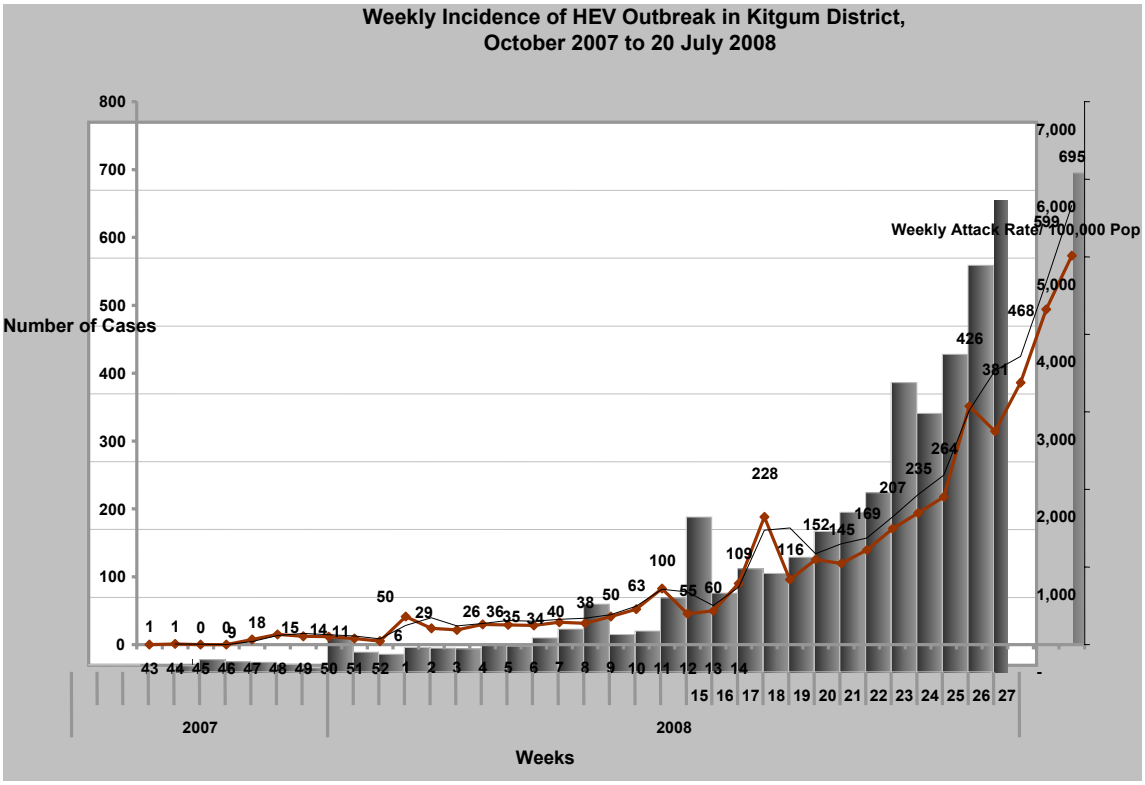
The situation

Kitgum, located in the Acholi sub region of Northern Uganda, reported suspected cases of Hepatitis E during the third week of November 2007 when a cluster of 6 cases were confirmed in Madi Opei Health centre IV of Lamwo (Health Sub District). An outbreak investigation conducted by the District Rapid Response Team and/or Taskforce (RRT) revealed that the initial case was a 40 year old pregnant woman who came from Southern Sudan to visit relatives in Madi Opei trading centre. She was seen at the local health facility with the signs and symptoms fitting the case definition of Hepatitis E. Laboratory confirmations of Hepatitis E was made in mid December 2007 after samples were sent to Uganda Viral Research Institute (UVRI) – Entebbe and were referred to the Center for Disease Control (CDC) in the United States for testing where they were confirmed as positive.

Reports indicate that between March and June 2008 Hepatitis E spread to other sub counties and neighbouring districts. By the end of the DREF operation, 13 of 19 sub counties were affected by Hepatitis E. This represents 68.4 percent of the district as being affected by Hepatitis E. The sub counties affected were Madi Opei, Agoro, Padibe East, Padibe West, Paloga, Akwang, Labongo Layamo, Kitgum Matidi, Kitgum Town Council, Mucwini, Lokung, Palabek Gem and Orom. Sporadic cases were reported and confirmed in Pader, Gulu and Yumbe in west Nile bordering Southern Sudan.

A cumulative total of 5,761 cases with 96 deaths were recorded at health facilities representing a CFR of 1.5 percent**.** Females were most affected, with the disease very prominent in pregnant women, resulting in miscarriages, still births and/or maternal deaths.

Extremely poor living conditions in internally displaced persons (IDPs) camps due to overcrowding, poverty, inadequate access to safe water and sanitation facilities were among the key risk factors which contributed to the spread of Hepatitis E for such a long period of time. The poor personal and household hygiene; notably poor hand washing practices, use of wide mouth water storage pots and/or vessels, communal hand washing, drinking water from streams, open defecations and lack of community ownership of community based epidemic response activities further compounds the problem. These risk factors continue to predispose these communities to the persistent transmission of Hepatitis E.



Coordination and partnerships

The URCS focused on improving cooperation with the Ministry of Health, the United Nations Children's Fund and the World Health Organization as well as other key stakeholders during the Hepatitis E response

programmes. A District Task Force involving local and international partners, URCS, and civil society organizations was re-activated in order to mobilize resources and coordinate joint response activities.

Regular joint meetings were convened between village health teams (VHTs) together with local councils, community hygiene facilitators and camp management volunteers to plan for the response. These teams were engaged in household hygiene education and/or promotion, sanitation and hygiene inspection within the camp and mobilization of the community to participate in implementation of community action plan.

Médecins sans Frontières disinfected all latrines in Madi Opei once a week during the three month operation. The role of maintenance of latrines was eventually transferred to the community through the local council one (LC1) and village health teams and/or community hygiene facilitators. The **Association of Volunteers in International Service** provided squat hole covers to all the latrines in Madi Opei camp.

Red Cross and Red Crescent action

The objective of the URCS was to sensitize people and prevent the spread of Hepatitis E in Kitgum District. To achieve this objective the URCS, through the DREF support, initiated the following activities to contribute to the control of Hepatitis E:

- Training sessions for volunteers in the targeted regions with a total of 104 trained volunteers to deliver key messages and information, education and communication (IEC) equipment.
- Talks on individual and collective measures against Hepatitis E.
- Home visits by Red Cross volunteers to conduct health and/or hygiene education and promotion.
- Social mobilization activities in market and other social places.
- Rural sanitation campaigns through safe water chain promotion, personal hygiene and proper latrine use.
- Monitoring chlorination and door to door household and/or latrine hygiene inspection and promotion.

The Uganda Red Cross Society used the sub county committees and community leaders to implement most of the activities. The recurrent episodes of Hepatitis E and the multiple factors underlying the phenomenon led the URCS to work more and more through an intervention network of multiple actors to maximize efforts in the fight against the disease and thereafter launching an appeal in August 2008 to reduce further outbreaks.

Progress towards objectives

Water, sanitation and hygiene promotion

Objective 1: To reduce the spread of Hepatitis E Virus through heightened health education, hygiene promotion and provision of sanitary facilities that mitigates the impact of the disease.

Planned activities

- Carry out social mobilization activities at community gatherings and door-to-door sensitization in partnership with the village health teams and community leadership.
- Develop, produce, translate and distribute posters, brochures and t-shirts in Luo language for community education and awareness creation.
- Construction of 100 stances of latrines in Madi Opei IDP camp to improve on latrine coverage and stop the open defecation.
- Procure and distribute water purification tablets at household levels.

Achievements

Door to door sensitization was conducted by 104 trained volunteers and 51 Local Councils in the main camps of Agoro, Potika A and Potika B, as well as return sites of Oboko, Lupulingi, Lugede, Ywaya and Apwoyo. The teams were divided into three working groups as follows:

1) Health and/or hygiene education and health and/or hygiene promotion.
2) Safe water chain promotion, personal hygiene, proper latrine use and monitoring chlorination.
3) Door to door household and/or latrine hygiene inspection and promotion.

Camp clean up was done twice a week (every Wednesdays and Saturdays). This activity included; general cleanness of the camp, such as sweeping, demolishing filled up latrines, garbage collection and disposal. The activity was launch by the Resident District Commissioner (RDC) and the District Chairman Local Council V.

Water chlorination was done in 21 water points and/or boreholes through bucket chlorination in Agoro Sub County and chlorination in the return sites (household chlorination). Bucket chlorination in all the 21 water points were handled by 2 chlorinators per water point per day and they worked in rotating shifts.

URCS Kitgum Branch received 10,000 tablets of chlorine under the Federation's DREF, 7,000 tablets from MSF, 10,000 tablets from OXFAM and 359,000 tablets from URCS Disaster Management department. Altogether a total of 386,000 tablets of chlorine (Aqua tabs) were received. A total of 107,000 tablets of Chlorine (Aqua tabs) were used for the chlorination of 2,140,000 litres of water in Agoro Sub County. These helped to reduce the spread of new Hepatitis E infections amongst the beneficiary communities.

The water quality analysis conducted in Agoro indicated that water at the source, particularly boreholes, was not contaminated but water at the households was heavily contaminated. The water quality testing was done in all boreholes and some randomly selected households. It is against this background that URCS made a request to International Committee of the Red Cross (ICRC) for 12,078 pieces of 20 litres jerry cans targeting 9,039 households in Agoro to improve the safe water chain (transportation and storage of water). The communities used very old jerry cans for transportation of water from the source to the households and the big mouth pots for storage and also as refrigeration. The water in these vessels was tested and the finding was that, the jerry cans were heavily contaminated with coliforms and the big mouth pots were also heavily contaminated as well. The system of drawing water from the big mouth pots (scooping with cups or calabashes) posed the risk of disposing the virus during the process.

A total of 260 stances of latrines were completed and 130 hand washing facilities were also provided to the community members. They were officially handed over to the sub county authorities and subsequently allocated to the beneficiaries communities. At least 10 households per latrine stance were allocated and this was particularly for proper and easy usage and maintenance. This has also improved on the latrine coverage of Agoro from 0 percent to almost 60 percent; however, the soil texture of Agoro (soft soil) requires a drainable latrine or ECOSAN latrine technology option that can resist the pressure of the soft soil and heavy rain. But the two technology options are appropriate for emergency because it takes a lot of time to construct it and they cannot be replicated by the community on their own because the materials are expensive.

URCS volunteers chlorinating the water at the boreholes

URCS volunteers chlorinating the water at the boreholes

National Society Capacity Development

Objective 2: To build the capacity of community volunteers in Kitgum branch to support the Ministry of Health efforts aimed at improving effective response to the HEV outbreak.

Planned activities

- Re-activate the 100 community-based first aid (CBFA) volunteers for further training in general HEV information, PHASTER methodologies and social mobilization skills.
- Provide logistical and technical support to Kitgum Red Cross Branch for effective response.

Achievements
A total of 104 community based volunteers (Village Health Teams) and 51 Local Council One Chairmen were trained in Participatory Hygiene and Sanitation Transformation (PHAST) methodology and communication skills and undertook social mobilization in three main group or sub committees: Health and/or hygiene education and promotion, promotion and supervision of chlorination for safe water chain at households in return sites and households' inspection.

For personal protection and identification, a total of 110 pairs of gumboots and 500 t-shirts were distributed to the trained volunteers and chlorinators and/or health workers in Agoro, and Potika IDP camps. In addition, 6 megaphones were procured and distributed to community volunteer team leaders in Kitgum to boost volunteers' social mobilization activities at public places such as markets and schools.

Objective 3: To strengthen Uganda Red Cross Society visibility and image in the community.

Planned activities
- Procure and provide volunteers with gumboots, raincoats, megaphones and caps.

Achievements

URCS produced and distributed IEC materials that included: 500 t-shirts, 30,000 brochures and 50,000 posters. All these IEC materials were printed with Hepatitis E prevention and control messages. The IEC materials were distributed by URCS, the District Health Officer's office, Ministry of Health's film vans, World Food Programme (WFP) in Kitgum, while WHO distributed in Kalongo and Pader Town Council in Pader District.

The distribution and display covered the entire 19 sub counties of Kitgum District. The film vans and WFP were the large distributors of the IEC materials. Film vans were distributing whenever they go for film shows on Hepatitis E in the villages while WFP were distributing along side their routine food distribution. Some of the posters developed included:

1) Poster that depict the safe hygiene practices that enhance the prevention of Hepatitis E.
2) Poster of good hand washing practices.
3) Brochures with pictures of social mobilization, roles of local leaders and pictures of the at risk groups such as pregnant women.
4) Most common question asked by the community during social mobilization and prepared answers.

Monitoring and evaluation

Achievements
The Branch Governing Board was involved in field monitoring and support supervisory visits that provided motivation to the volunteers. At the end of the operation five monitoring visits had been conducted by the Branch Governing Board members including official hand over of latrines and opening and closing of volunteers' trainings. This helped ensure that the activities were implemented as planned in the project.

Joint inter-agency monitoring and/or supervisory visits headed by the Resident District Commissioner were conducted in all the 13 affected sub-counties and this helped to streamline and synchronize operations as well as mobilize community participation.

Challenges

The challenges identified during the course of this project included: Inadequate financial resources to consolidate and consistently implement the existing strategies in Agoro sub-county; inadequate behaviour change by the community towards healthy hygiene practices and behaviours despite intensive health and hygiene education; low self esteem within the population, dependency syndrome among the IDPs has made community mobilization for construction of latrines difficult.

Limited staff capacity in the Kitgum Branch to monitor, supervise and support the volunteers' field activities since the departure of the loaned WatSan volunteer. This is due to the fact that the Branch Field Coordinator alone was required to coordinate activities within the task force members and other branch related functions and thus gave him little time for field activities.

There was inadequate staff in the rural health centres that in itself discouraged members of the community from reporting cases to the health facilities. As an alternative, they resorted to seek for services from traditional healers in the communities.

Recommendations

Due to the long incubation period of Hepatitis E virus that makes it difficult to control the epidemic within a short time, the URCS recommended that its activities continue in Agoro for the next six months and also that it takes up some of the new places that have recorded cases and are without any partner to intervene.

More financial resource allocation to procure the lacking and yet urgently required items identified as gaps in the intervention, this will facilitate holistic intervention that contributes to quick curtailing of the disease spread.

The URCS needs to recruit a temporary staff member (6 months) with relevant technical capacity in WatSan to support the human resource gap in Kitgum.

The URCS needs to consider deploying health workers from amongst the professional volunteer forces to be deployed to Agoro Health Centre to boost the case management that is weakened due to inadequate staff in the rural health facilities.

Since there is a possibility that the current free residual chlorine concentration measuring about 0.3 mg/L in the water is adequate to kill the coliforms, but not strong enough to kill the Hepatitis E virus. There is a suggestion from CDC experts that the residual free chlorine concentration be increased to 0.5 mg/L so long as the taste and smell will not discourage its consumption. This shall be tested and changed over gradually.

Conclusion

The Hepatitis E outbreak continues to spread through the district and the neighbouring districts. The sub county authorities in the district need to actively take lead in the implementation of the emergency strategies to contain Hepatitis E. There is a need for all agencies in the Water Sanitation and Hygiene (WASH) to scale up and or accelerate their intervention consistently for at least four months. Social mobilization needs to be strengthened in terms of coordination and articulating information on Hepatitis E to the community. URCS should consider a more comprehensive Hepatitis E strategy that can enhance the all-round intervention of the virus.

How we work

All International Federation assistance seeks to adhere to the Code of Conduct for the International Red Cross and Red Crescent Movement and Non-Governmental Organizations (NGO's) in Disaster Relief and is committed to the Humanitarian Charter and Minimum Standards in Disaster Response (Sphere) in delivering assistance to the most vulnerable.

The International Federation's activities are aligned with its Global Agenda, which sets out four broad goals to meet the Federation's mission to "improve the lives of vulnerable people by mobilizing the power of humanity".

Global Agenda Goals:

- Reduce the numbers of deaths, injuries and impact from disasters.
- Reduce the number of deaths, illnesses and impact from diseases and public health emergencies.
- Increase local community, civil society and Red Cross Red Crescent capacity to address the most urgent situations of vulnerability.
- Reduce intolerance, discrimination and social exclusion and promote respect for diversity and human dignity.

Contact information

For further information specifically related to this operation please contact:

- **In Uganda:** Michael Nataka, Secretary General, Uganda Red Cross Society, Kampala, Email:

natakam@redcrossug.org; telephone: +256 41 258 701/2; fax: +256 41 258 184

- **In Kenya:** Nancy Balfour, Disaster Management Coordinator, East Africa Zone, Nairobi, phone: +254 20.283.5208 Fax: +254 20.271.2777; nancy.balfour@ifrc.org
- **In Kenya:** Dr. Asha Mohammed, Head of Zone, Eastern Africa Zone Office, Nairobi; Phone: +254 20.283.51.24; Fax: +254 20.271.27.77; email: asha.mohammed@ifrc.org
- **In Geneva**: John Roche, Federation Operations Coordinator (East and Southern Africa), phone: +41.22.730.440 email: john.roche@ifrc.org

<Final financial report below; click here to return to the title page>

International Federation of Red Cross and Red Crescent Societies

MDRUG009 - Uganda Hepatitis E Virus

Final Financial Report

Selected Parameters	
Reporting Timeframe	2008/1-2008/12
Budget Timeframe	2008/1-2008/12
Appeal	MDRUG009
Budget	APPEAL

All figures are in Swiss Francs (CHF)

I. Consolidated Response to Appeal

	Goal 1: Disaster Management	Goal 2: Health and Care	Goal 3: Capacity Building	Goal 4: Principles and Values	Coordination	TOTAL
A. Budget		**173,401**				**173,401**
B. Opening Balance		**0**				**0**
Income						
Other Income						
Voluntary Income		*168,246*				*168,246*
C5. Other Income		***168,246***				***168,246***
C. Total Income = SUM(C1..C5)		**168,246**				**168,246**
D. Total Funding = B +C		**168,246**				**168,246**
Appeal Coverage		**97%**				**97%**

II. Balance of Funds

	Goal 1: Disaster Management	Goal 2: Health and Care	Goal 3: Capacity Building	Goal 4: Principles and Values	Coordination	TOTAL
B. Opening Balance		0				**0**
C. Income		168,246				**168,246**
E. Expenditure		-168,246				**-168,246**
F. Closing Balance = (B + C + E)		0				**0**

International Federation of Red Cross and Red Crescent Societies

MDRUG009 - Uganda Hepatitis E Virus

Final Financial Report

Selected Parameters	
Reporting Timeframe	2008/1-2008/12
Budget Timeframe	2008/1-2008/12
Appeal	MDRUG009
Budget	APPEAL

All figures are in Swiss Francs (CHF)

III. Budget Analysis / Breakdown of Expenditure

Account Groups	Budget	Expenditure						Variance
		Goal 1: Disaster Management	Goal 2: Health and Care	Goal 3: Capacity Building	Goal 4: Principles and Values	Coordination	TOTAL	
	A						B	A - B
BUDGET (C)			**173,401**				**173,401**	
Supplies								
Clothing & textiles	5,005							**5,005**
Water & Sanitation	53,385							**53,385**
Total Supplies	**58,390**							**58,390**
Personnel								
Regionally Deployed Staff	34,377							**34,377**
Total Personnel	**34,377**							**34,377**
Workshops & Training								
Workshops & Training	7,455							**7,455**
Total Workshops & Training	**7,455**							**7,455**
General Expenditure								
Travel	14,699							**14,699**
Information & Public Relation	44,064							**44,064**
Office Costs	3,143							**3,143**
Total General Expenditure	**61,907**							**61,907**
Contributions & Transfers								
Cash Transfers National Societies			157,310				**157,310**	**-157,310**
Total Contributions & Transfers			**157,310**				**157,310**	**-157,310**
Programme Support								
Program Support	11,271		10,936				**10,936**	**335**
Total Programme Support	**11,271**		**10,936**				**10,936**	**335**
TOTAL EXPENDITURE (D)	**173,401**		**168,246**				**168,246**	**5,155**
VARIANCE (C - D)			**5,155**				**5,155**	