# Disasters



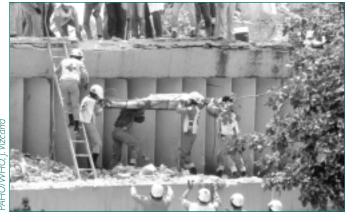
### Preparedness and Mitigation in the Americas

Issue No. 100

News and Information for the International Community

August 2005

#### **Capturing Progress in Disaster Reduction:** 100 Issues of the *Disasters* Newsletter



t was 1979 when PAHO published the

first issue of its quarterly newsletter

Disaster Preparedness in the Americas (the

word "mitigation" was added to the title in

1992). At that time, PAHO had neither e-

mail nor a fax machine to keep abreast of

disaster preparedness activities in and

beyond the Americas. Instead, the Organization relied on a steady stream of

memos and cables to learn about meetings,

research, publications and other initiatives

underway within the relatively small disas-

ter community. The first newsletter was

typed (yes, on a typewriter), photocopied

and sent by hand to a very limited circle of people who were interested in developing contacts and learning more about this area of growing interest: preparing to face the health effects of disasters.

Today, many things have changed. Not only is the software and hardware used to put together a newsletter

much more sophisticated, the number and diversity of channels (some would say the excess of channels) through which we receive news have multiplied at such a rapid pace that it is virtually impossible to keep up with who is doing what in the Americas, let alone the rest of the world.

What has not changed, however, is why and for whom this newsletter is published. The Disasters newsletter has attempted to showcase the initiatives and steps taken by countries in Latin America and the

(continued on page 7)

#### New multimedia simulation on volcanic eruptions



AHO and a number of organizations in Colombia and Ecuador have been working to improve health preparedness for volcanic emergencies. Now, multimedia software has been developed to enable health Emergency Operations Centers (EOC) to conduct simulation exercises.

All simulation exercises require a good script and PAHO enlisted the help of vulcanologists to prepare realistic scenarios of simulated events. The next step was to design and develop the software to place students in situations in which they must solve problems or react pragmatically. This new simulation software has advantages over traditional paper-based exercises in

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## News from PAHO/WHO

News from PAHO/WHO

## LSS: the Interagency Logistics Support System

AHO, together with UNICEF, WFP, OCHA, UNHCR and WHO, has completed the first phase of development of the Logistics Support System

(LSS). The LSS is a common approach to logistics support

that helps to consolidate and share information, improve transparency and register and monitor undocumented items, particularly

unsolicited donations.

The first phase involved the design and development of the system, which required the agreement of all parties and the actual writing of the software. It also encompassed testing and quality control. The LSS software (as is the case with the SUMA system) looks specifically at coordination functions that are not addressed by the systems developed or contracted by larger humanitarian actors. LSS will serve as an inventory control tool for smaller agencies (including national institutions) that cannot afford the cost and human resources to develop their own systems.

The next phase of development will involve the production of training materials (manuals and software on CD-ROM), the creation of an LSS web site, the translation of the system into other languages, field testing (to be carried out globally), the training of trainers, and the formation of an LSS team.

This comprehensive instrument—designed to minimize duplication and improve how agencies respond to actual needs—will be available to all institutions and will build on their own management capacity. For more information about the LSS write to Nicolas Lagomarsino at <a href="mailto:lagomars@paho.org">lagomars@paho.org</a>.

#### The Tsunami in South Asia: Six Months Later

he rebuilding and reconstruction phase that is underway in many countries in South Asia affected by the devastating Indian Ocean earthquake/tsunami of December 2004 has

opened a window of opportunity for the health sector of these countries to strengthen their health systems in a long-term, sustainable manner.

Six months after the disaster, local health capacity and infrastructure are being fortified and local health professionals have been trained to serve their communities better. WHO has focused on a number of areas, such as disease surveillance to help prevent major outbreaks, providing technical advice by mobilizing public health experts, developing technical guidelines and training courses, and coordinating the health response.

Medical supplies and equipment have been provided to affected hospitals and medical centers. The public health laboratory in the Maldives has received a water purification system and accessories to assist in surveillance and monitoring of chemical and microbiological contaminants in food.

All activities are being developed and carried out in close coordination with the government health authorities in each affected country to ensure sustainability. For example, the epidemiological surveillance and outbreak response system, established in the province of Aceh, Indonesia, will now be used as part of the country's routine integrated disease surveillance.

For more about the World Health Organization's activities visit <a href="www.whosea.org">www.whosea.org</a> and click on "Complete Tsunami Coverage." This excellent site includes many reports and feature stories, a tsunami photo library and emergency health guidelines. See page 6 for a new publication on WHO's post-tsunami health activities.







Photos: WHO/SEARC

More than six months
after the tsunami,
WHO continues to
focus on long-term
health capacity
development.

## Other Organizations

Other Organizations

### Mark your Calendar for a Live Webcast on Public Health and Disasters

The University of Pittsburgh (USA) will broadcast a lecture—live via the Internet—on public health, giving it what organizers predict will be the largest audience for an academic lecture in history. The lecture will discuss how epidemiologists can improve their response to disasters, such as by measuring the extent of a disaster and the effectiveness of assistance offered to its victims. Eric Noji, a special assistant to the U.S. Surgeon General for Emergency Preparadness will deliver the lecture.

The lecture, part of the John C. Cutler Global Health Lecture series, will be publicly available through the University's School of Public Health web site on **September 29 at 4:00 p.m.** (U.S. Eastern Daylight Time) or GMT 20:00 hours. Bookmark this site: <a href="www.publichealth.pitt.edu">www.publichealth.pitt.edu</a>, click on the "Inside GSPH" section on the right. Educators worldwide are invited to "donate" lectures on international health to the series. The lecture is available in five formats and if you are interested in viewing or distributing it by videoconferencing, telephone, PowerPoint or print media write to Ronald LaPorte (<a href="mailto:ronlaporte@aol.com">ronlaporte@aol.com</a>).

#### Worth mentioning...

An intensive five-day training workshop on malaria control in complex emergencies will be held in New York in October. The fee-paying workshop is aimed at humanitarian organizations providing country program support and involved in policy development, agencies that fund and/or provide technical support in an emergency context and trainers and policy makers with an interest in public health in emergencies. Contact <a href="mailto:sian@mentor-initiative.net">sian@mentor-initiative.net</a> for more information.

Visit www.disastereducation.org to download a copy of Talking about Disaster: Guide for Standard Messages, a publication produced by the National Disaster Education Coalition. The guide covers topics such as chemical accidents, earthquakes, drought, floods, hurricanes and more, and is designed to provide disaster safety information to the general public. Although produced primarily for a U.S. audience, much of the information is useful for emergency managers, disaster (natural and human-caused) educators, public affairs personnel, mitigation specialists, the media and communicators outside the U.S. as well.

#### MERCOSUR and Member States Present Advances in Risk Management

ember States of MERCOSUR, the Southern Common Market, met to discuss advances made in risk reduction and disaster response, in line with strategic guidelines agreed upon at the first meeting of the intergovernmental commission of risk management and vulnerability reduction. Highlights of the countries' presentations:

Argentina: presented its contingency response plan for an influenza pandemic and the new regional information network and database of common risks and vulnerabilities—natural, technological, and biological.

*Brazil:* briefed participants on several human resources capacity building initiatives, including the PAHO LEADERS course, which Brazil has adapted into Portuguese for a national audience and the course on Hazardous Substances developed and carried out by CETESB, a national environmental agency, and risk management and vulnerability reduction initiatives within the framework of MERCOSUR.

Chile: presented the "Andean Strategic Plan for Health Sector Emergency Preparedness and Response," as a reference for similar strategic plans in MERCOSUR and member states. The plan emphasized the need for regional disaster response teams, with tools to assess damage and needs in the health sector and manage disaster information to make humanitarian assistance more effective.

*Uruguay:* created a national legal framework for risk management and vulnerability reduction.

**Paraguay:** presented the conclusions from several lessons learned workshops on the Ycua Bolaños supermarket fire. In addition to reviewing health sector lessons learned, a second workshop explored the response by a variety of sectors to the disaster and the third workshop with participants from Chile, Argentina and Peru to look at coordination among institutions, humanitarian assistance, mass casualty management, mental health and disaster communications.

In the near term, the MERCOSUR Risk Reduction Commission will look at strengthening health emergency operation centers and situation rooms; focus on "safe hospitals" as a strategy and indicator of vulnerability reduction; create national and regional disaster response teams and develop a roster of experts to conduct damage and needs assessments in the health sector. For more information, contact cgarzon@ecu.opsoms.org.

## **Member Countries**



#### Fire Sweeps through Calderon Guardia Hospital in Costa Rica

fire swept through one of the wings of the Calderon Guardia Hospital, a major health facility in San Jose, Costa Rica, in the early morning hours of July 12. Nineteen people lost their lives. The hospital, which housed highly sophisticated equipment, sustained losses that topped US\$17 million. The facility was unable to continue functioning, with the exception of the emer-



gency wing, which was not affected and quickly became a temporary hospital for the patients that were evacuated.

The fire caused the loss of use of 522 hospital beds. Patients were quickly evacuated within one hour, although it was impossible to evacuate patients from one of the surgical units, many of whom were on life support. Seventeen patients lost their lives in this unit, along with two nurses who valiantly tried to assist them. One of these nurses was the coordinator of the hospital's disaster committee which had been quickly put into service once the fire broke out.

The Calderon Guardia was a busy hospital, dealing with 360 emergency room visits daily. The wing that was affected by the fire will have to be demolished; the other wing, which was evacuated, is being rehabilitated to recover the use of 200 beds. Another 100 beds have been relocated to the emergency wing.

A PAHO expert report following the disaster recommends organizing an interdisciplinary technical committee, with effective leadership, to review and analyze Costa Rica's health services network before considering the reconstruction of the destroyed hospital wing. It will be necessary to examine the operational capacity of Costa Rica's health services network to deal with medical care issues at the primary and intermediate level and, after reviewing these issues, to plan and organize the new Calderon Guardia Hospital with the services, technical complexity and number of beds it really needs to function properly.



This tragedy brings to light, once again, the need to ensure that our hospitals are safe from man-made as well as natural disasters and that they do not contribute to the loss of human life. For more about the Safe Hospitals initiative, visit <a href="https://www.paho.org/disasters">www.paho.org/disasters</a>.

### In South America, Andean Institutions and Disaster Coordinators Adopt Disaster Strategy, Call for Safe Hospitals

At the annual meeting of ministers of health of the Andean countries (Bolivia, Chile, Ecuador, Peru and Venezuela), delegates paid particular attention to disaster issues, approving the content of a health sector disaster preparedness and response strategic plan 2005-2010 and adopting the motto "safe hospitals in disaster situations" as an Andean risk reduction policy. They emphasized the importance of building new hospitals and health facilities with a level of protection that ensures their functionality in disaster situations and implementing the appropriate mitigation measures to reduce risk to existing facilities.

The Plan grew out of interagency work sessions (attended by representatives from the offices of external relations and disasters in the ministries of health; CAPRADE, the Andean Region Disaster Preparedness and Response Committee; the IFRC; the Convenio Hipólito Unánue and PAHO/WHO) which identified common needs, developed a strategic plan and mechanisms to achieve results.

At a subsequent meeting, CAPRADE adopted the health sector strategic plan as part of the Andean disaster reduction strategy. This will provide a framework in which countries can conduct joint exercises, support regional response teams for damage and needs assessment, epidemiological surveillance, and more; and strengthen disaster preparedness in the health sector.

Among the first steps countries will take to strengthen the health sector to respond to emergencies is to prepare or update their own health sector plans and promote health service networks under the concept of "safe hospitals." The countries will also look at developing knowledge, research, and information management by promoting risk management training in educational institutions.

When the disaster coordinators from the ministries of health of South American countries met, they took forward these commitments, and presented an action plan for disaster preparedness and response that closely followed the strategic guidelines developed in

(cont. on page 5, col. 1)

both the Andean Region and those prepared by MERCOSUR. Among the priority actions for 2005 are: preparing an inventory of hospitals that have conducted vulnerability studies; conducting an internal assessment of the safety of their health facilities; stepping up training in the SUMA system and in health damage and needs assessment; greater advocacy for incorporating risk management in the curriculum of the region's institutions of higher learning. Other issues considered a priority were mental health, prevention and protection against fires, chemical emergencies and disaster communications. For more information contact cgarzon@ecu.ops-oms.org.

## PAHO's Central America Disaster Office to Move to Panama

In the last few years, Panama has become a hub of activity in the field of disaster management, as several UN agencies—among them OCHA, UNICEF, UNDP and WFP—have located their regional offices there. With a view to joining forces to improve coordination of disaster reduction efforts in Central America, PAHO will relocate its subregional disaster office from San Jose, Costa Rica to Panama City at the beginning of 2006. Contact information for the new office will be published in an upcoming issue of this newsletter.

### Cuba to Host International Seminar on Hospitals

A seminar on the Hospital of the XXI Century will take place in Havana, Cuba from 11-14 October. Hospitals in disaster situations will be one of the topics covered and will include discussions on identifying the vulnerability of a hospital and implementing mitigation measures; hospital response to internal and external disasters and more. For further information contact Dr. Guillermo Mesa Ridel, Director of the Latin American Center for Disaster Medicine at mesa@clamed.sld.cu.

#### 2005 Hurricane Season Ramps Up Early

urricane Emily was an unpredictable storm from the beginning. It struck Grenada as a category 1 hurricane on July 13 causing damage to many of the same health facilities that were battered by last year's Hurricane Ivan. Other Caribbean countries were spared devastation by Emily, which passed over the Mexican Yucatan Peninsula as a category 4 hurricane and later struck the country's northern states of Tamaulipas, Nuevo Leon, Veracruz and Coahuila.

This is the second year in a row that Grenada has experienced a direct hurricane hit and many residents were still struggling to recover from Hurricane Ivan in 2004. At the Richmond Home for the Elderly, one third of the roof was torn off and lost. The windows were damaged and water penetrated the facility, soaking patients and beds. Persons on the top floor had to be relocated to the ground floor. The repairs to the Richmond Home, undertaken last year in the wake of Hurricane Ivan with the cooperation of the Guyana Defense Force, were only temporary in nature.

The Princess Royal Hospital in Carriacou lost its galvanized roof (set last year after Hurricane Ivan) and part of the roof's wooden structure. Patients had been either discharged or relocated to other facilities.

The St. George's Hospital suffered damage to the operating theatre and the facility was flooded when windows were blown away. The Duncan Ward of the St. George's General Hospital, which was retrofitted several years ago, withstood damage for the second time, as was the case following Hurricane Ivan. There was some minor leaking as water entered through windows. The laboratory was protected with anticipation and by and large, the hospital remained fully functional.

Hurricane Emily passed over Mexico's Yucatan Peninsula on July 18 as a category 4 hurricane with 135 mph winds, causing less damage than was initially anticipated. An unfortunate helicopter accident in the Gulf of Mexico prior to the hurricane's arrival resulted in two deaths, but no additional deaths were reported once the storm struck. Most of those who were evacuated (nationals and tourists) returned relatively quickly.

Mexico's Secretary of Health conducted a damage assessment and visited shelters in the Yucatan Peninsula. According to government sources, some 50,000 people were evacuated and 23,500 were temporarily in shelters. Health officials monitored a potential increase in cases of dengue and took necessary precautions. As Hurricane Emily struck Mexico for the second time, another 44,000 people were evacuated in the northern states, but health sector needs were handled by the government and no damage to infrastructure was reported.









Photos from Grenada by Tony Gibbs

Even a category I
hurricane can cause
significant damage
to infrastructure
already weakened
during last year's
hurricane season.

## **Publications and Multimedia**





#### **ICRC Publishes Best Practices**



Operational best practices regarding the management of human remains and information on the dead by non-specialists is the title of a new publication on the subject from the International Committee of the Red Cross. It is a compilation of all recommendations and best practices relating to the proper handling of the remains of those who die directly or indirectly due to an armed conflict or internal violence, for implementation by non-specialists. The publication enables humanitarian organizations to incorporate these recommendations and best practices into their policies, training and operations. Download a PDF version of the manual from <a href="https://www.icrc.org/eng">www.icrc.org/eng</a> (search for "operational best practices"). More on the same topic in the PAHO/WHO publication <a href="management of Dead Bodies in Disaster Situations">Management of Dead Bodies in Disaster Situations</a> at <a href="www.paho.org/disasters">www.paho.org/disasters</a> (click on Publications Catalog).

#### The Tsunami and After: WHO's Role



"The aftermath of the tsunami presented a great public health challenge to WHO. However, every disaster presents opportunities to both countries and international agencies to strengthen their capabilities and capacity," said Dr. Samlee Plianbangchang, WHO's s South-East Asia Regional Director. Health systems in many of the affected countries had been devastated. For example, in Aceh, Indonesia, 53 of the 244 health facilities were destroyed or

severely incapacitated. Fifty-seven of the 497 provincial health office staff died, while 59 were reported missing. WHO assisted the health sectors of the affected countries, at their request, to strengthen their resources and set up systems where they had been destroyed. In meeting the needs of the affected areas, WHO also provided technical guidelines and medical supplies. Resources were mobilized in partnership with the government health authorities.

### Compendium of Articles Seeks to Define Disasters



What is a Disaster? New Answers to Old Questions is the title of a new volume, edited by R.W. Perry and E.L. Quarantelli, which addresses this most basic question: that of defining the phenomenon. It is important that researchers begin to develop a consensus about the meaning of disasters and related phenomena and this book brings together 12 social scientists to share their definition and vision of disasters. In the process, a wide range of views are expressed and issues raised regarding the relationship of academic vs. practical definitions and the impact of grouping types of disasters in different ways. The editors close the volume with discussions of an agenda for disaster research in the twenty-first century.

The book, published in 2005 and available in English only, can be purchased from Xlibris Publishers (www.Xlibris.com; Orders@Xlibris.com) for US\$25.

#### 100 Issues of the Disasters Newsletter

(from page 1)

Caribbean (and beyond) to prepare for and respond to the health consequences of disasters. From the earliest issues, it has promoted a horizontal exchange of knowledge and ideas among disaster professionals by citing contact information for each news piece (a much quicker task today, thanks to e-mail, than in 1979!)

Today, the print newsletter coexists with an online Internet version, which is available on PAHO's disaster web site (www.paho.org/disasters). The e-newsletter is available at least three weeks before the print copy reaches your office or home by mail. If you would like to know when the electronic version is online, drop us a note

DID YOU KNOW ...

- Since 1998, the share of readers from outside North America (Canada, Mexico and the US) has increased by 2%.
  The number of those who subscribe to the electronic newsletter has reached an all-time high of 6,500 or 25%
- The number of those who subscribe to the electronic newsletter has reached an all-time high of 6,500 or 25% of total subscribers.
- Our Caribbean readership comprises 14% of all of our present subscribers.
- Which country in the Americas (excluding the U.S.) has the largest number of readers of Disasters:
- Preparedness and Mitigation in the Americas? Mexico, followed by Colombia and Peru.
- Subscribers in Mexico, Central America and South America make up 57% of all our subscribers, a jump from 52% in 1998!
- Our newsletter is published in Spanish (57% of our readership) and English (43%).
- Fifteen percent of our readers describe themselves as academics; 31% are affiliated to the health sector and 7% to civil defense organizations.

at <u>disaster-newsletter@paho.org</u> and you will be added to the e-mail distribution list.

Speaking of e-mail distribution lists, you can join the almost 6,500 people, or 25% of our subscriber database, who have sent us their e-mail address and now receive

news items between issues of the newsletter. Your e-mail address will remain private, your mailbox will not be overloaded and you can opt at any time to unsubscribe. Send your e-mail address to <u>disasternewsletter@paho.org</u>.

#### **Multimedia Program for Volcano Preparedness**

(from page 1)

that the computer interface, with video images, radio spots, photos, written reports and other documentation, immerses the user in a situation that is as close-to-reality as possible, without being exposed to the actual risks of a volcanic eruption. To conduct the simulation exercise properly, the software must run on nine individual computers that have been connected to a local area network.

As participants progress through the exercise, they are forced to interpret and act on a large volume of information, both qualitative and quantitative. They can then measure the results, negotiate and discuss their decisions. As in real disaster situations, decisions are generally taken in a climate of uncertainty, where there is only a partial understanding of the actions of colleagues and other entities participating in the exercise. During the process, participants test their knowledge of preparedness measures along with communication and negotiation skills.

This tool not only allows users to learn more about the behavior of volcanoes, the characteristics of the threat (lahars, pyroclastic flows, ash and gases) and the potentially adverse effects on health, but also to appreciate the complexity of the decisions that an EOC must take and the importance of coordination and communication, both internally and between sectors. The exercise promotes the health EOC as a key preparedness and emergency management tool and lets the players "live" the importance of forming and maintaining an updated situation room that provides information and analysis for decision making.

The exercise ends with a joint evaluation by all the participants: evaluators, observers, and the players themselves. Most of the 50 people that have already field tested the software in workshops in Colombia and Ecuador said it was an extremely helpful learning experience that allowed them to evaluate their knowledge and decision-making skills and improve teamwork in stressful situations. Their evaluations of the script, the software, and the methodology will be used to adjust a subsequent version of the simulation, which will be field tested in Central America later this year.



This multimedia simulation exercise is currently available in Spanish only, and was developed in the framework of a DIPECHO project financed by the European Commission Humanitarian Office. For more information, contact Ricardo Perez, rperez@ecu.ops-oms.org.

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Correspondence and inquiries should be addressed to:

The Editor

Disasters: Preparedness and Mitigation

in the Americas

Pan American Health Organization

525 Twenty-third Street, N.W.

Washington, D.C. 20037, U.S.A.

Tel: 202-974-3527 • Fax: 202-775-4578

E-mail: disaster-newsletter@paho.org www.paho.org/disasters/

Regional Disaster Information Center

Apdo. 3745-1000, San José, Costa Rica

Fax: (506) 231-5973

E-mail: crid@crid.or.cr

www.crid.or.cr

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