EUROPEAN FORUM FOR DISASTER RISK REDUCTION
MACEDONIAN CHAIRMANSHIP

United Nations
International Strategy for Disaster Reduction

COUNCIL OF EUROPE CONSEIL DE L'EUROPE

2nd meeting of the European Forum for Disaster Risk Reduction (EFDRR) 10 – 12 October 2011, Skopje

ISDR and its Science and Technical Committee – rising to new challenges

Professor Virginia Murray

Member of the ISDR Science and Technical Committee

Head of Extreme Events and Health Protection
Health Protection Agency, London, UK

Outline

Third Global Platform

- Chair's Summary
- Science and Technical Committee
- HFA MTR 2011
- WHO/HPA/UNISDR Disaster Risk Management for Health
- Climate change

Health Protection Agency

UK development

Proposal for science & technology


3RD
GLOBAL PLATFORM
for Disaster Risk Reduction
Invest Today for a Safer Tomorrow
Increase Investment in Local Action
World Reconstruction Conference
WRC High L
FDRR

Chair's Summary

Third Session of the Global Platform for Disaster Risk Reduction
and World Reconstruction Conference, Geneva, 8-13 May 2011

http://www.preventionweb.net/globalplatform/2011/

1. The Third Session of the Global Platform for Disaster Risk Reduction and the World Reconstruction Conference met in Geneva, 8-13 May 2011. Opened by the United Nations Secretary-General BAN Ki-Moon and chaired by the Deputy Secretary-General, the Global Platform recognized Doctor Susilo Bambang Yudhoyono, President of the Republic of Indonesia as a Global Champion of Disaster Risk Reduction.

2. This Session of the Global Platform brought together the broadest ever cross-section of people committed to building resilience – including several Heads of State, Ministers, a Managing Director of the World Bank, over 2,600 delegates representing 168 Governments, 25 inter-governmental organizations, 65 non-governmental organizations, Parliamentarians, private sector, local government, academic institutions, civil society and international organizations.

3. Half of humanity is now living in cities. By 2050 urbanization will rise to 70 percent and urban risk will increase as well. Risk is further driven by factors such as rural and urban poverty, climate change, declining ecosystems, and development choices including in energy infrastructure. Commitment to resilience is urgently needed particularly in vulnerable groups,

Global Platform
for Disaster Risk Reduction
Third Session, Geneva, Switzerland
8 - 13 May 2011

World Reconstruction Conference
Geneva, May 10-13, 2011
Recovering and Reducing Risks after Natural Disasters

Chair's Summary

Third Session of the Global Platform for Disaster Risk Reduction
and World Reconstruction Conference, Geneva, 8-13 May 2011

http://www.preventionweb.net/globalplatform/2011/

7.8 Actively engage and support scientific and technical communities to inform decision-making

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Global Platform
for Disaster Risk Reduction

Second Session, Geneva, Switzerland 16 – 19 June 2009

- Programme
- Plenary
- Informal Plenary
- Pre-session Events
- Special Events
- Round Tables
- Market Place
- Media Events
- Statements

Welcome to the second session of the Global Platform for Disaster Risk Reduction website

This website documents proceedings and outcome of the second session of the Global Platform. The meeting took place at the Centre International de Conférences de Genève (CICG), Geneva, Switzerland from Tuesday to Friday, 16-19 June 2009.

Proceedings: Second Session of the Global Platform for Disaster Risk Reduction

4 December 2009

Conference proceedings released:
Please find the proceeding of the Second Session of the Global Platform for Disaster Risk Reduction available for download in PDF.

ISDR

International Strategy for Disaster Reduction

Reducing Disaster Risks through Science

Issues and Actions

The Full Report of the ISDR Scientific and Technical Committee 2009

Topics selected



- **Climate change**
- Changing institutional and public **behaviour to early warnings**
- **Improving resilience** to disasters through social and economic understanding
- Knowledge of the wide **health** impacts of disasters

Global Platform
for Disaster Risk Reduction
Third Session, Geneva, Switzerland
8 - 13 May 2011

World Reconstruction Conference

Statement on Science and Technology for the Third Session of the Global Platform for Disaster Risk Reduction

This statement presents recommendations related to science and technology in support of the outcomes of the Third Session of the Global Platform for Disaster Risk Reduction. It includes emerging priority issues in support of the implementation of the Hyogo Framework for Action (Annex 1) and a report on the work of the ISDR Scientific and Technical Committee (STC) (Annex 2).

The statement is prepared by the ISDR Scientific and Technical Committee (STC) based on work with scientific, technical and thematic networks, the Global Assessment Report 2011 (GAR), the Mid Term Review of the Hyogo Framework for Action, the Intergovernmental Panel on Climate Change Special Report on Managing the Risks of Extreme Events and Disasters to Advance Climate Change Adaptation (SREX), the outcomes of the International Disaster Risk Conference (IDRC, Davos 2010), the work of the Integrated Research on Disaster Risk (IRDR) programme and many other scientific and technical partners. A preparatory workshop for the Global Platform for Disaster Risk Reduction Third Session on science and technology was held in Pavia, Italy, 5-6 April 2011.

This statement also builds on the report 'Reducing Disaster Risks through Science: issues and action' presented at the Second Session of the Global Platform by the ISDR STC. The report

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Statement on Science and Technology

Professor Virginia Murray

on behalf of ISDR Scientific & Technical Committee

3rd Session of Global Platform for Disaster Risk Reduction

ISDR Science and Technical Committee process

based on work with scientific, technical and thematic networks and many other scientific and technical meetings

Global Assessment Report 2011 (GAR)

Mid Term Review of the Hyogo Framework for Action (HFA MTR)

Intergovernmental Panel on Climate Change **Special Report on Managing the Risks of Extreme Events and Disasters to Advance Climate Change Adaptation** (SREX)

ISDR Science and Technical Committee

Insufficient implementation of **known** disaster risk reduction principles and **existing knowledge**

Recent disasters stressed **emerging, interrelated risks with cascading effects**

Need for integrative risk reduction and disaster management process based on **scientific and technical evidence**

ISDR Science and Technical Committee

Intensify efforts to follow a **science based decision making process** in disaster risk reduction

Support a process of comprehensive and rigorous **review of the status of science and technology** for disaster risk reduction

Global support to make scientific and technical support affordable for **economically weak countries**

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International Strategy for Disaster Reduction

Hyogo Framework for Action 2005 - 2015

Building the Resilience of Nations and Communities to Disasters

http://www.unisdr.org/eng/hfa/docs/HFA-brochure-English.pdf

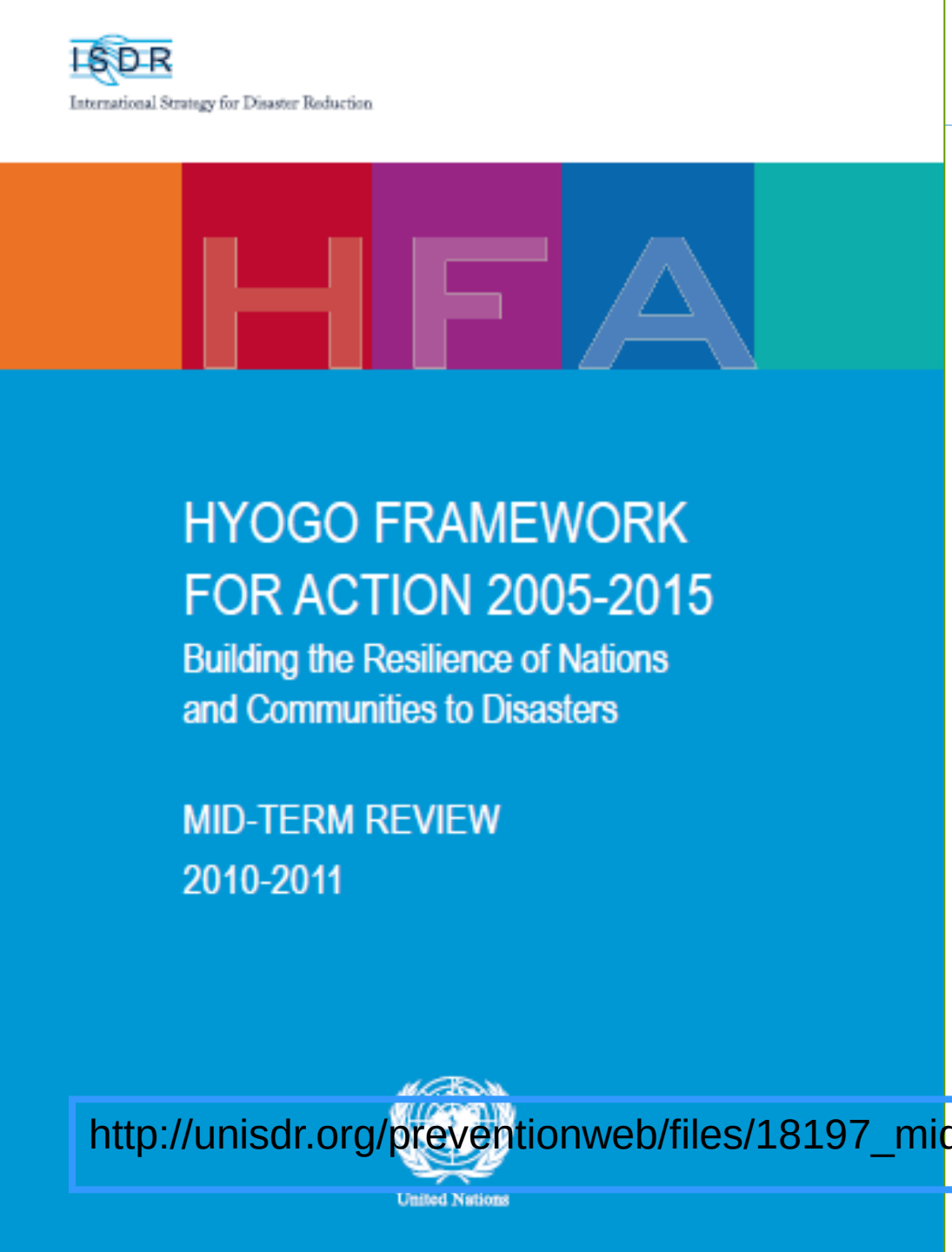
Hyogo Framework for Action 2005-2015

Building the resilience of nations and Communities to Disasters



1. Governance: organizational, legal and policy frameworks - **Make Disaster Risk Reduction a Priority;**
2. Risk identification, assessment, monitoring and early warning - **Know the Risks and Take Action;**
3. Knowledge management and education - **Build Understanding and Awareness;**
4. Reducing underlying risk factors - **Reduce Risk;**
5. Preparedness for effective response and recovery - **Be Prepared and Ready to Act**





http://unisdr.org/preventionweb/files/18197_midterm.pdf

ISDR
International Strategy for Disaster Reduction

HFA

HYOGO FRAMEWORK
FOR ACTION 2005-2015
Building the Resilience of Nations
and Communities to Disasters

assess disaster impact and losses in a comparable way. As noted in the study commissioned for the Mid-Term Review Report on the use of databases for disaster risk reduction: "much of the existing operational research related to emergencies and disasters lacks consistency, is of poor reliability and validity and is of limited use for establishing baselines, defining standards, making comparisons or tracking trends." [85]

United Nations

http://unisdr.org/preventionweb/files/18197_midterm.pdf

Evidence for Disaster Risk Management – Information and knowledge needs for policy makers and field practitioners

TASK for HFA Mid Term Review:

Case study on how data/information relating to all risks, hazards and disaster management is collected, held and analyzed, in order to facilitate the use of high quality information by decision makers at all levels

Undertaken by: *Professor Virginia Murray, with advice from colleagues in UNISDR Science and Technical Committee Sub Committee, and Health Protection Agency colleagues Dr Ishani Kar-Purkayastha, Dr Delphine Grynzpan, Jonathan Abrahams, Health Action in Crises, World Health Organisation and Dr Altaf Musani, World Health Organisation Mediterranean Center for Health Risk Reduction*

This study is intended to highlight the importance of making evidence-based multi-hazard impact assessments. It identifies tools that can be borrowed from the scientific community to achieve a better understanding of disaster risks and to define their predictability.

PLoS Currents | Disasters

PLoS Currents: Disasters is a new open-access publication from the Public Library of Science (PLoS, http://www.plos.org) for the rapid communication of new research results and operational analyses derived from the study or management of all types of disasters. The aim of *PLoS Currents: Disasters* is to provide a new channel, particularly for data and analyses that might not otherwise be openly shared or where rapid and timely sharing is especially important. *PLoS Currents: Disasters* will be launching in August 2011.

Scope

PLoS Currents: Disasters will consider any content relevant to disasters-natural or manmade, local, regional or global.

Possible topics include: description of disasters; effects of disasters on the environment or on human populations; immediate management of disasters, both environmental and clinical; disaster risk management; disaster risk reduction; follow up of disasters, short and long term; implementation of the Hyogo Framework for Action 2005-2015.

Specific article types

- Case studies, surveys, or other research (clinical, environmental, etc.) of previous or ongoing disasters

DEALING WITH DISASTER DATABASES – WHAT CAN WE LEARN FROM HEALTH AND SYSTEMATIC REVIEWS?

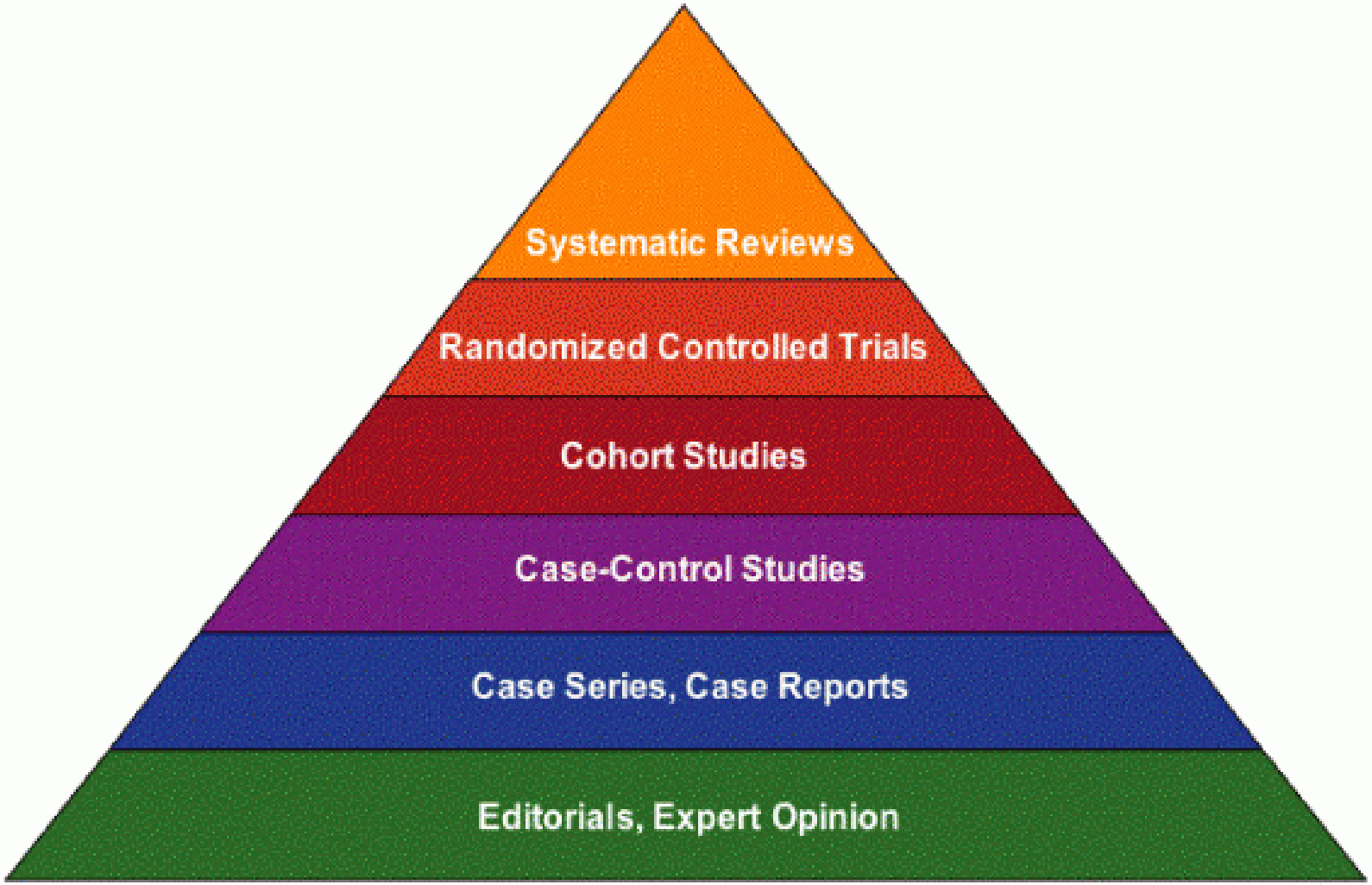
Application in practice

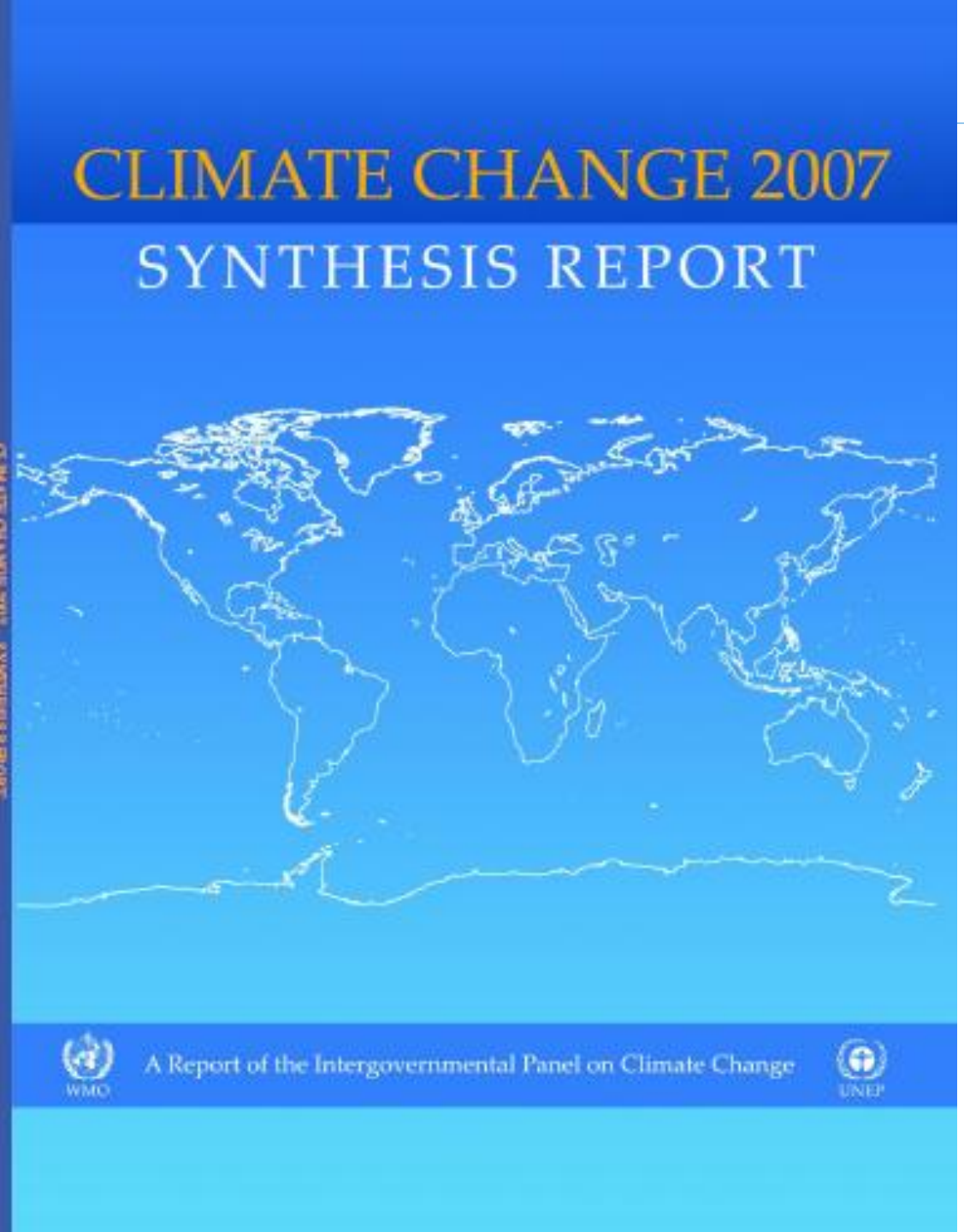
There is an increasing move towards facilitating the use of research findings in policy and practice relating to disaster risk reduction and response. One of the key issues is the quality of the evidence available to decision-makers. Disaster databases, as a key resource, represent a tremendous investment of effort and goodwill. However, their usefulness is limited by the variability in how they are compiled, differences in the output they produce, a general lack of comparability and standardization, and the fact that they might produce different results due to the ways they have been created or by chance. One possible solution to this, which has been applied successfully in evidence synthesis in health care is the systematic review. In this study we attempt to show how the systematic review process may be applied to information and data that is held in disaster databases. We demonstrate that systematic reviews of disaster databases can be achieved in a technical sense and the potential value of such reviews, but also discuss the practical difficulties that arise.

Key words
Systematic review, evidence, disaster database

Hierarchy of research evidence

Ho P M et al. Circulation 2008;118:1675-1684





- http://www.ipcc.ch/publications_and_data/publications_ipcc_fourth_assessment_report_synthesis_report.htm

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Managing the Risks of Extreme Events and Disasters to Advance Climate Change Adaptation (SREX)

SREX Approved Outline

1. **Climate change: new dimensions in disaster risk, exposure, vulnerability, and resilience**
   - Risk reduction, risk management, risk transfer
   - Coping vs. adapting
   - Extreme events vs. extreme impacts

2. **Determinants of risks: exposure and vulnerability**
   - Dimensions of vulnerability
   - Vulnerability profiles
   - Coping and adaptive capacities
   - Assessment of and trends in vulnerability
   - Risk identification, risk accumulation, and the nature of disasters

3. **Changes in climate extremes and their impacts on the natural physical environment**
   - Weather and climate events related to disasters
   - Climate extremes and impacts: past and current changes
   - The causes behind the changes
   - Climate extremes and impacts: projected long term changes

IPCC WG II • Technical Support Unit
c/o Carnegie Institution for Science
260 Panama Street

IPCC honoured with the 2007 Nobel Peace Prize

IPCC
Phone: +41-22-730-8208/84
Phone: +41-22-730-8208 /84/54
Email: IPCC-Sec@wmo.int

Hospitals Safe from Disasters

Reduce Risk, Protect Health Facilities, Save Lives

Home | Why Safe Hospitals? | Join Us | Resources | Media Room | Good Pr

Home ▸ Home

One Million Safe Schools and Hospitals

The 'One Million Safe Schools and Hospitals Initiative' was launched in
initiative with the slogan "Make a Pledge, Save a Life" encourages a
community, organization, government, or business entity to pledge
safer from disasters in three ways: as an advocate, leader or champ

Read the the Advocacy Guide
One Million Safe Schools and Hospitals in Indonesia - July 2010
More information from the ISDR website
IRIN news: When hospitals become casualties

Kathmandu Declaration on Protecting Health Facilities from Disasters

Health Ministers from WHO's 11 Member States in South-East Asia hav
committed themselves to making health facilities more resilient by
adopting the Kathmandu Declaration on Protecting Health Facilities
from Disasters. This declaration was adopted at the conclusion of the
Twenty-seventh Health Minister's Meeting in Kathmandu in September
2009.

Read the declaration

Call for abstracts

ISDR International Strategy for Disaster Reduction

World Health Organization

THE WORLD BANK

2008-2009 World Disaster Reduction Campaign

Hospitals Safe from Disasters

Reduce Risk, Protect Health Facilities, Save Lives


NHS
London
Review of five London hospital fires and their management
JANUARY 2008 – FEBRUARY 2009
REPORT
EMERGENCY
Preparedness

World Health Organization

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Thematic Platform: Disaster Risk Reduction for Health

Disaster

Introduction

At the 2009 Global Platform for Disaster Risk Reduction, participants supported a proposal to establish a Thematic Platform for Disaster Risk Reduction for Health. The launch of this platform, dedicated to protecting public health through disaster risk reduction, coincides with the International Day for Disaster Reduction on 14 October 2009.

The World Health Organization (WHO) and the United Nations Secretariat for Inter-

Disaster Risk Management for Health

OVERVIEW

What is disaster risk management for health?

Disasters and other emergencies often result in significant impacts on people's health, including the loss of many lives. Every new threat reveals the challenges for managing health risks and effects of emergencies and disasters. Deaths, injuries, diseases, disabilities, psychosocial problems and other health impacts can be avoided or reduced by disaster risk management measures involving health and other sectors.

Disaster risk management for health is multisectoral

The overview places disaster risk management in the context of multi-sectoral action and focuses on the generic elements of disaster risk management, including potential hazards, vulnerabilities of a population, and capacities, which apply across the various health domains.

The accompanying fact sheets identify key points for consideration within a number of essential health domains.

However, importantly, all health domains are interlinked; each fact sheet should therefore be considered as part of the entire set and in conjunction with the

World Health Organization

Health Protection Agency

United Nations
International Strategy for Disaster Reduction

Disaster Risk Management for Health
CHEMICAL SAFETY

Key Points

- Prevention of chemical emergencies includes:
  - safe location of chemical facilities away from residential areas
  - reducing the amount of stored toxic and flammable chemicals
  - building in technical controls and redundancy to provide safe use of chemicals and management of waste.
- Preparation for a chemical release includes:
  - scenario analyses and impact assessment
  - planning for, training and exercising the response, including the installation of a public warning system,
  - training and equipping responders to deal with loss of containment.
- Detection and alert includes the development of systems to recognize chemical events as early as possible and scaling up an appropriate incident response.
- Response includes the containment of the chemical release, decontamination, management of health consequences and risk assessment.
- Recovery includes activities such as risk and impact assessment in order to design care, remediation and protective actions, clean-up and investigation of the root cause to prevent recurrence.

Examples
India (1984) & France (2001)

On 3 December 1984, over 40 tons of methyl isocyanate gas leaked from a pesticide plant in Bhopal, India, immediately killing at least 3,800 people and causing significant morbidity and premature death for many thousands more.[1]

A huge explosion ripped through AZF (Azote de France) ammonium nitrate fertiliser factory in an industrial zone on the outskirts of Toulouse, France on 21 September 2001. Thirty-one people died in the event and approximately 2500 were injured. More than 500 homes became uninhabitable.[2]

Why is this important?

A chemical incident is the unexpected release of a substance that is (potentially) hazardous either to humans, other animals or the environment.[3]

Chemical releases arise from technological incidents, impact of natural hazards[4], and from conflict and terrorism.[5]

The International Federation of the Red Cross has estimated that between 1998 and 2007, there were nearly 3 200 technological disasters, including chemical incidents, with approximately 100 000 people killed and nearly 2 million people affected.[5]

The management of chemical incidents requires a multi-disciplinary and multi-sectoral approach - the health sector may play a supporting or a leadership role at various stages of the management.

What are the health risks?

Chemical incidents can cause injury through four basic injury mechanisms which can also be strongly interrelated:

- **Fire** produces injuries through heat and exposure to toxic substances (including combustion products).[6]
- **Explosion** produces traumatic (mechanical) injuries through the resulting shockwave (blast), fragments and projectiles.
- **Toxicity** may result when humans come into contact with a chemical released from its containment, be it from storage or transport, or as reaction or combustion products. Toxicity can cause harm by a wide array of toxic mechanisms ranging from chemical burns to asphyxiation and neurotoxicity.
- **Mental health effects** are not only determined by exposure to the chemical, fire or explosion but also by "exposure to the event" itself.

Severe incidents have the potential to disrupt the lives of casualties through injury, loss of relatives, property or employment and societal disruption.

Disaster Risk Man
CHEMICA

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Disaster Risk Management for Health
CHILD HEALTH

Key Points

- 30-50 percent of fatalities arising from natural events are children
- The main causes of mortality in children are usually the same conditions that cause morbidity in non-emergency settings
- Children are vulnerable but disaster risk reduction can help minimise the risks from hazards.
- Children have a vital role to play when building community resilience and should be involved in planning for, responding to and recovering from natural disasters

Children draw maps of their village in the Irrawaddy Delta, Myanmar. Two thirds of the children in the village were killed when Cyclone Nargis swept across the delta in May 2008. Photo Tina Salsbury, Save the Children.

Why is this important?

Children, especially those under the age of five are particularly vulnerable to disaster. They are more likely to be injured, lost, unable to access help or health care, or exposed to greater danger through separation from their families or caregivers.

In most disasters, between a third and a half of the dead are children.[1]

It is currently estimated that around 250 million people are affected, each year, by disasters, and this number is likely to increase to 350 million over the next decade. Half this number are thought to be children.

The exact health effects from a disaster depend on the type of disaster, for example earthquakes can lead to critical multiple injuries, flooding can lead to outbreaks of diarrhoea. However disasters often exacerbate the most common causes of childhood mortality worldwide. These include acute respiratory illness, diarrhoea, malaria and measles, malnutrition and neonatal causes.

Disasters also affect development and delay the attainment of the Millennium Development Goals. The countries least likely to achieve the MDG targets are the same as those experiencing or recovering from disasters and acute or chronic humanitarian crises

Whilst children are more vulnerable to the effect of disaster, this need not be the case. Good disaster risk reduction for health can help reduce the effects of a disaster on the health of children.

What are the health risks?

Communicable diseases and vector borne illness including acute respiratory illness, diarrhoea, malaria and measles.

- These are the most common causes of child mortality globally but all of these have been shown to increase when crises occur.
- Disasters can also increase the risk of outbreaks such as cholera as a result of flooding, measles as a result of overcrowding following population displacement.

Disaster Risk Man
CHEMICA

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Developed by the World Health Organization, Uni

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Developed by the WHO, United Kingdo

Disaster Risk Management for Health
CLIMATE RISK MANAGEMENT

Key Points

Climate risks have a significant effect on public health in terms of malnutrition, diarrhoeal disease, trauma and air pollution.

A combination of increasing vulnerability and risk of weather-related hazards are expected to result in more extreme events and disasters.

Measures to reduce the health impacts from climate risks and associated climate change, include:

- strengthening public health systems based on partnerships with multisectoral actors
- enhancing capacity of health systems to reduce risks and respond to public health emergencies
- protecting hospitals and other health infrastructure from climate risks and effects of climate change
- strengthening surveillance and control of infectious disease against climate risk
- improving the use of early warning systems by the health sector
- building public health interventions at local level to increase community resilience

Examples

Europe heat wave (2003) *The hot summer of 2003 in Europe produced sustained record high temperatures which resulted in markedly higher death rates than normal, particularly among the elderly population. In total, 70 000 more deaths occurred in western Europe during that summer than expected.*[1]

Rainfall and flooding *Small changes in average precipitation can have a very large effect on the extremes of rainfall events that cause flooding, and human influence on the global climate is likely to make what would currently be considered a "very wet winter" in the United Kingdom, or a "very wet summer" in the South Asian monsoon region, about five times more frequent by the second half of this century.*[1]

Why is this important?

Globally, the number of reported weather-related natural disasters is increasing.[1]

- Reports of extreme weather events and natural disasters have more than tripled since the 1960s.
- In 2007, 14 out of 15 appeals for emergency humanitarian assistance were for floods, droughts and storms – five times higher than in any previous year.[1]

The last few decades have seen rapid growth in populations living in flood plains and coastal areas, particularly in cities in developing countries.

Climate change has driven extreme high temperatures and has probably contributed to more frequent and extreme precipitation events and more intense tropical cyclone activity. Together, these trends will increase the risk of weather-related hazards to human health.[1]

What are the health risks?

Climate change is happening now and it inevitably affects the basic requirements for health: clean air and water, sufficient food and adequate shelter.

Each year, about 3.5 million people die from malnutrition, 2.2 million from diarrhoea, 800 000 from causes attributable to urban air pollution, and 60 000 in climate-related disasters, mostly in low resource settings and also frequently in humanitarian emergency situations.[2]

Climate change brings new challenges and costs to the control of infectious diseases as some are highly sensitive to temperature and rainfall, including cholera and the diarrhoeal diseases, as well as vector borne diseases including malaria, dengue and schistosomiasis.[3]

Climate change threatens to reverse the progress that the global public health community has been making against many diseases, and increase the challenges for the humanitarian community to respond to natural, biological and social emergencies.[3]

Developed by the World Health Organization, United Kingdom Health Protection Agency and partners

Disaster Risk Management for Health

- Chemical safety
- Child health
- Climate Change management
- Communicable disease
- Disabilities
- Mass casualty management
- Mass fatalities
- Mental health and psychosocial support
- Non-communicable diseases
- Nutrition
- Radiation emergencies
- Safe hospitals
- Sexual and reproductive health
- Water & Sanitation for Health

Useful Definitions and Early Warning Information for Natural Hazards

These basic definitions are presented in order to promote a common understanding on the subject of natural hazards. It is extremely difficult to reach consensus on definitions of different natural hazards and extreme weather events. The definitions proposed within this glossary have been drawn from various sources and developed by the United Kingdom Natural Hazard Partnership through a process of reiteration among the constituent partner agencies including the UK Met Office, British Geological Survey, the National Oceanographic Centre, UK Space Agency, and the Flood Forecasting Centre). Further inputs have been provided by the World Meteorological Organization and the World Health Organization Regional Office for Europe. These definitions provide a reference for further progress on a shared understanding of definitions of natural hazards and extreme weather events.'

<table>
<tr><th>Term</th><th>Definition</th><th>Early Warning Information</th></tr>
<tr><td>Cyclones (Typhoons/ Hurricanes)</td><td>A tropical cyclone is one formed over tropical or sub-tropical waters with organised convection and a definite cyclonic surface wind circulation.
WMO nomenclature is as follows:
<table><tr><th></th><th>Wind on Beaufort Scale</th></tr><tr><td>Tropical depression</td><td>≤ 7</td></tr><tr><td>Moderate tropical storm</td><td>8 & 9</td></tr><tr><td>Severe tropical storm</td><td>10 & 11</td></tr><tr><td>Hurricane</td><td>12</td></tr></table>Called a tropical cyclone in the Indian Ocean, Cyclone in Arabian Sea or Bay of Bengal, Typhoon in western Pacific and Willy-Willy in western Australia and in most other tropical latitudes a Hurricane.
Meteorological Glossary. Lewis, R.P.W 6th Edition.

A non-tropical cyclone is one where atmospheric pressure distribution is such that there is a low central pressure relative to its surroundings. It is characterised on a synoptic chart by a system of closed isobars, generally approximately circular or oval in form, enclosing a central low pressure.</td><td>Prediction of seasonal cyclone activity is now possible using knowledge of sea temperature anomalies (teleconnections).

Designated warning centres using observational data and weather models are able to predict tropical cyclones for up to several days ahead.

For non tropical cyclones, alerts are issued 5 days with warnings issued with lead times of 24 hours or more.</td></tr>
<tr><td>Heat waves</td><td>The World Meteorological Association has not defined the term 'heatwave', nor are there any alternative universally accepted definitions. However heat waves are generally understood to be prolonged periods of unusually hot dry or hot humid weather that may have an impact on human and natural systems.

In the EuroHEAT project a heat-wave was defined as a period when the maximum apparent temperature* (a measure of relative discomfort due to combined heat and high humidity, developed by RG Steadman in 1979) and minimum temperature are over the 90th percentile of the monthly distribution for at least two days.
http://www.euro.who.int/__data/assets/pdf_file/0010/95914/E92474.pdf

This definition takes into account local variability in baseline climactic conditions and reflects the finding from a survey of the meteorological services in Europe that</td><td>Monthly and seasonal trend to hotter weather is now possible. Warnings issued 2-5 days in advance of a heat wave.

A review of heat-health action plans in Europe found that most plans were organised at country-level, with some at regional or local level. In most cases, heat-health warnings were issued by the national meteorological office with public health actions organised and implemented through Ministries or Departments of Health.
http://www.euro.who.int/__data/assets/pdf_file/0010/95914/E92474.pdf

In England and Wales, a Heat-Health Watch system operates from 1 June to 15 September each year. This comprises four levels of response based upon threshold maximum daytime and minimum</td></tr>
</table>

http://www.hpa.org.uk/web/HPAwebFile/HPAweb_C/1296686244041 and http://www.who.int/hac/events/disaster_reduction_2011/en/

- Reducing key infections
- Minimising the health impact of environmental hazards including radiation, chemicals, poisonings and extreme events such as flooding
- Supporting safe and effective biological medicines

Extreme Events and Health Protection Section

- provides a **focal point** for **health protection** planning, response and recovery to extreme weather events and natural disasters at
  - local
  - national
  - international

Extreme Events and Health Protection Section

Health Protection Agency

- provides a **focal point** for **health protection** planning, response and recovery to extreme weather events and natural disasters at

World Health Organization

WHO Collaborating Centre on Mass Gatherings & Extreme Events

Extreme weather events and natural disasters

In the event of a major natural disaster or emergency, such as a severe flood or heatwave, the HPA's specialists in environmental hazards, infectious diseases and emergency planning, work together alongside local and national agencies such as the NHS, police, local government and Environment Agency, to provide health protection advice to affected communities through their network of Health Protection Units across England.

The Health Protection Agency has been involved in advising on health implications of extreme weather events such as: the extensive flooding in the South West in 2007, the volcanic ash cloud caused by an Icelandic volcano in early 2010, and research into the effects of extreme cold weather and heatwaves.

The HPA's new extreme events and health protection section collates information about natural disasters and extreme weather events both from within the HPA and from national and international partners, and provides relevant up-to-date evidence based information to support the planning for extreme events.

Related Information

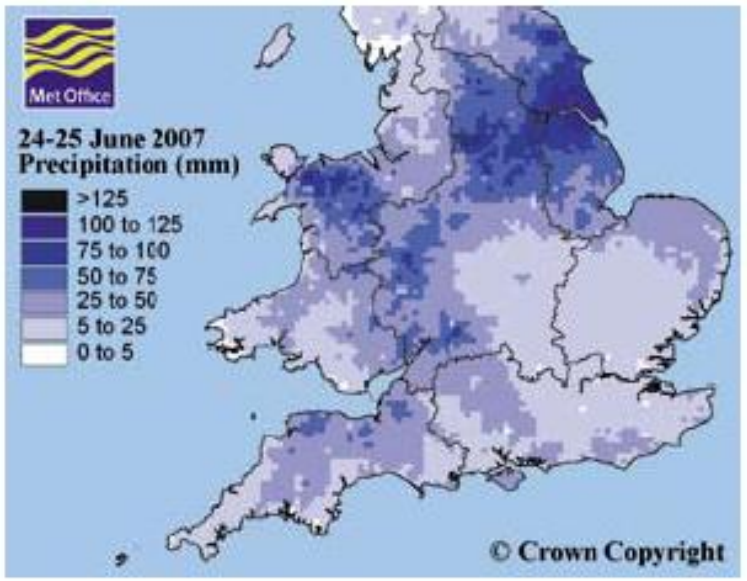
›› International Event Response
›› Natural disasters
›› Extreme Events and Health Protection Section (EEHPS)
›› Real-time Syndromic Surveillance

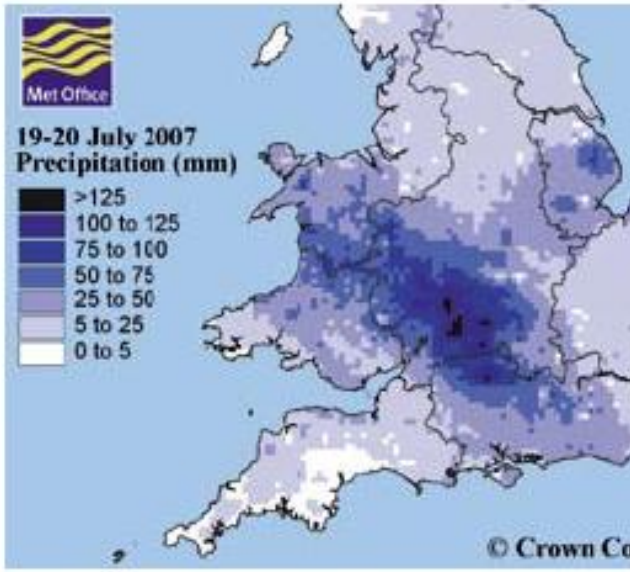
External Links

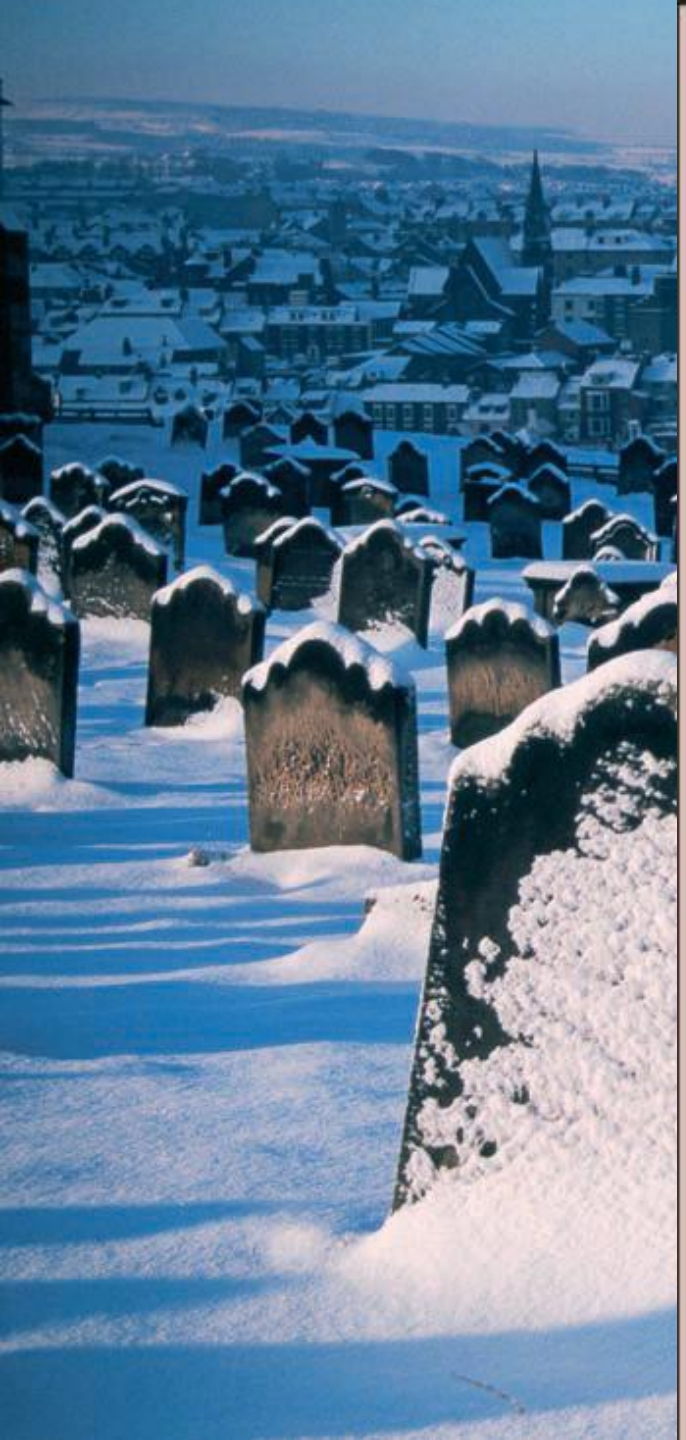
›› WHO disaster information
›› UN International Strategy for Disaster Reduction
›› CDC - Natural Disasters & Severe Weather
›› Met Office - extreme weather events
›› Environment Agency
›› British Geological Survey

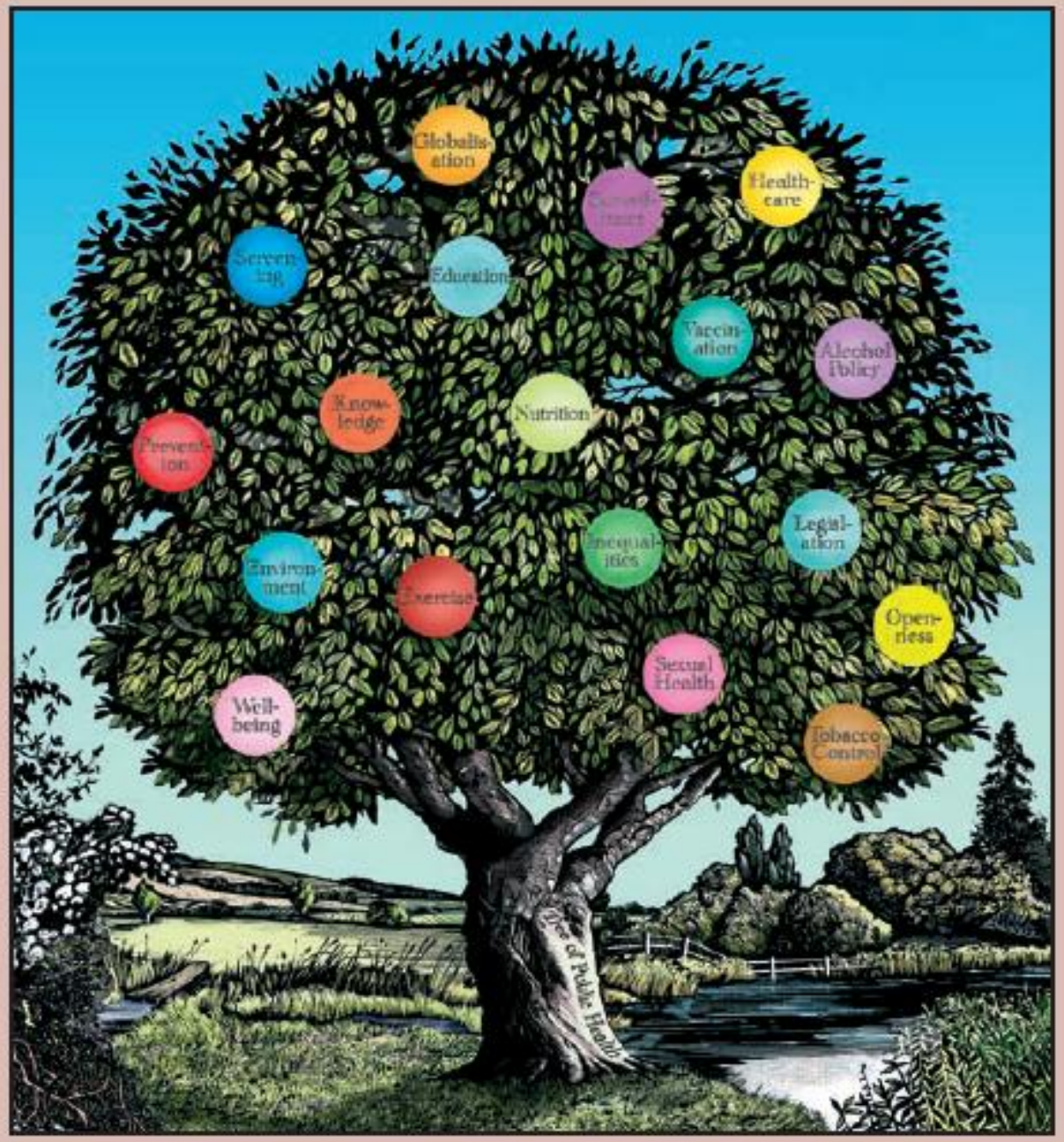
Figure 1 – Precipitation Levels for England and Wales during 24–25 June and 19–20 J

heatwave





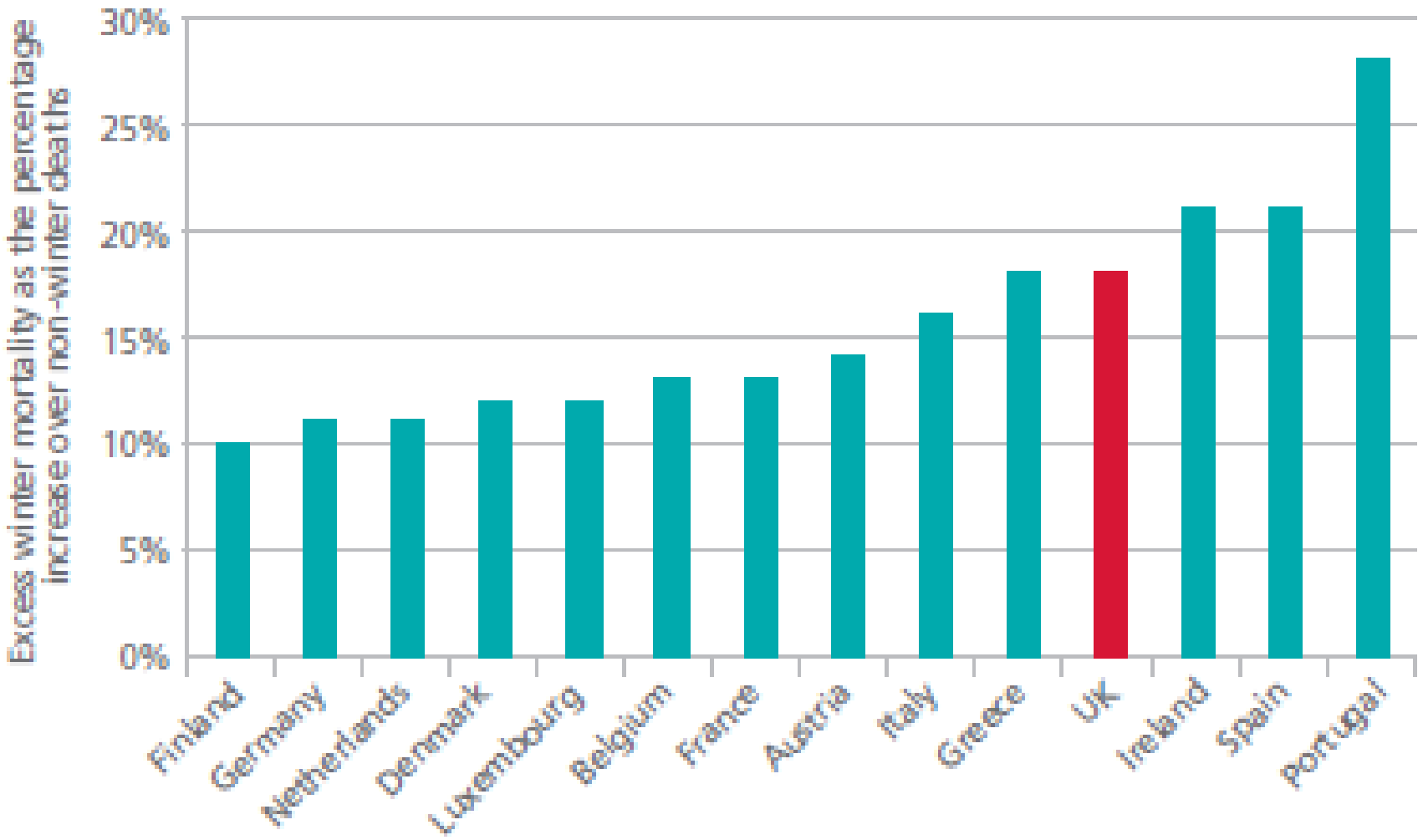




Department of Health

2009 ANNUAL REPORT
OF THE CHIEF MEDICAL OFFICER

Figure 2: Excess winter mortality by country



Source: Healy JD. Excess winter mortality in Europe: a cross country analysis identifying key risk factors. *Journal of Epidemiology and Community Health* 2003; 57(10): 784–9

Pilot of

The Cold Plan: A Public Health Winter Weather Plan for England

2010-2011

Level 1: Winter preparedness – runs from 1st November to 31st March, and also includes long-term planning activities.

Level 2: Alert and readiness – is declared when the Met Office forecasts a 60% risk of severe winter weather in the following days.

Level 3: Severe weather action – indicates that the severe winter weather is now occurring, and is expected to impact on people's health and on health services.

Level 4: Major incident – indicates that significant parts of the country are experiencing exceptionally severe winter weather. Such weather conditions are likely to have significant impacts not only on health, but also on other sectors and critical infrastructure. A cross-governmental response may be required.

Cold Weather Survey for EFDRR

Cold Weather Survey for EFDRR

This survey has been developed by the United Kingdom's Health Protection Agency and Civil Contingencies Secretariat. We want to learn if European countries have any Cold Weather warning systems. Please complete this questionnaire, even if you do not have a Cold Weather warning system.

1. Please give your name, organisation and contact details

name	
your country	
your organisation	
postal or email address	

2. Does your country have a warning system for Cold Weather?

- ○ Yes
- ○ No


Met Office
RIMNET
defra
Department for Environment Food and Rural Affairs
CEH
Centre for Ecology & Hydrology
NATURAL ENVIRONMENT RESEARCH COUNCIL
CabinetOffice
UK SPACE AGENCY
British Geological Survey
NATURAL ENVIRONMENT RESEARCH COUNCIL
Ordnance Survey
Environment Agency
National Oceanography Centre, Southampton
UNIVERSITY OF SOUTHAMPTON AND NATURAL ENVIRONMENT RESEARCH COUNCIL
Natural Hazards Partnership
Health Protection Agency
FLOODFORECASTINGCENTRE
Environment Agency
Met Office

Outline

Third Global Platform

- Chair's Summary
- Science and Technical Committee
- HFA MTR 2011
- WHO/HPA/UNISDR Disaster Risk Management for Health
- Climate change

Health Protection Agency

UK development

Proposal for science & technology

Way forward?



- Worldwide, effects of extreme weather events and natural hazards are apparent, having increasing significance for human health

- For 2013 Global Platform it is key that we can show how we:

> 7.8 Actively engage and support scientific and technical communities to inform decision-making

- How can we best do this via the **European Forum for Disaster Risk Reduction (EFDRR)?**