



Dengue

WHAT IS DENGUE?

Dengue is a flu-like 'often severe' viral illness spread to humans by the bites of *Aedes* mosquitoes. High fever, severe headache, muscle and joint pain, nausea and vomiting are common symptoms that are frequently accompanied by a rash.

What is dengue haemorrhagic fever?

Dengue haemorrhagic fever (DHF) is a sometimes fatal complication of dengue characterized by high fever and a tendency to bleed. After a few days of fever the patient's condition may rapidly deteriorate, leading to circulatory failure. Death can follow within 12 to 24 hours if proper hospital care is not provided.

Facts about dengue and DHF:

- Dengue and DHF are now endemic in more than 100 tropical and subtropical countries / areas of the Americas, the Eastern Mediterranean, South-East Asia, the Western Pacific and Africa.
- There is no specific treatment for dengue and DHF. However, appropriate care provided by experienced physicians and nurses frequently saves lives of DHF

patients. Maintaining the proper fluid balance in the body is paramount to managing DHF.

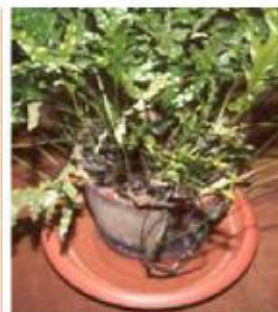
- Dengue often spreads rapidly, affecting a great number of people during epidemics. In the most severely affected countries / areas children are the most vulnerable group.
- Dengue is an environmental issue. Population growth, particularly in urban areas, and inadequate water and sanitation services have produced conditions favourable for mosquitoes to breed and viruses to spread.

What is the burden of disease caused by dengue and DHF?

WHO estimates that:

- there are 50 million infections worldwide every year resulting in around 24 000 deaths, mostly among children;
- At least 2.5 billion people – two fifths of the world's population – are at risk of infection.

Aedes aegypti, the most important dengue mosquito, breeds in collections of water inside and close to dwellings. Domestic water storage cement tanks, clay pots, metal drums and concrete cisterns are commonly infested; as are discarded tyres, plastic and other containers, and flower vases.

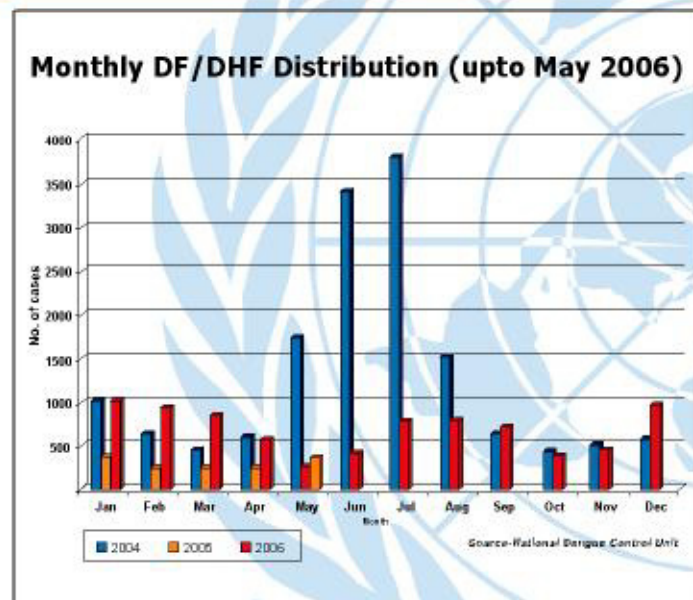


What is the impact of dengue and DHF?

Dengue and DHF represent a significant economic burden on the communities affected resulting in:

- loss of lives;
- considerable expense to the family for the hospitalization and care of the patient, in addition to travel costs;
- loss of work among patients and their carers;
- Considerable expense to Ministry of Health and local government authorities for mosquito control activities.
- Disruption of health care services and economies, including loss of tourism revenue.

The cost of control measures and medical services during the 2004 epidemic of DF/DHF in Sri Lanka was over US \$ 1.32 million.



What measures are being taken to prevent and control dengue and DHF?

To reduce the burden caused by dengue and DHF, WHO is promoting implementation of the global Strategy.

What is the Global Strategy?

The Global Strategy provides the basis for regional and national programme planning and integrates the following essential elements:

1. Application of mosquito control measure through:

- removal or protection of containers where mosquitoes breed;

- chemical control via application of insecticides to kill larvae in water containers or as sprays to kill adult mosquitoes during outbreaks;
- biological control using small fish or tiny predatory freshwater crustaceans called copepods that are very effective in controlling mosquitoes in water storage containers and wells;
- Improvement of water and sanitation services.

2. Active surveillance of disease, virus transmission and mosquitoes, based on a strong health information system.

3. Emergency preparedness for dengue outbreaks:

- development of emergency and contingency plans;
- education of the medical community;
- Emergency mosquito control using health communication strategies to inform the population about action to be taken.

4. Capacity building and training in order for health workers to improve their skills and actions on surveillance, laboratory diagnosis, management of the illness and mosquito control.

5. Social mobilization of communities and decision-makers to incorporate dengue prevention and control in their aims and activities

6. Changes in behaviour through effective communication strategies aimed at influencing behaviour among individuals, households, communities, institutions and decision-makers.

