ChemiNet

The WHO Global Chemical Incident Alert & Response Network aims to combat outbreaks of illness of chemical aetiology of international concern

What is it?
ChemiNet is a network of networks which pools human and technical resources to assist Member States to deal more effectively with the public health and medical aspects of chemical incidents and emergencies, including outbreaks of illness of chemical etiology.

ChemiNet (established by WHO/IPCS) represents the chemical capacity of the Global Outbreak Alert and Response Network (GOARN) working towards global health security.

ChemiNet draws on human and technical resources from institutions, agencies and academia in Member States as well as from international organizations (e.g. IOMC, Participating Organizations, OPCW, UN OCHA).

ChemiNet currently the following networks: (i) WHO/IPCS International Enquiry Response Network for Chemical Incidents; (ii) the WHO/IPCS INTOX Global Network of Poison Centres; (iii) interested members of the WHO Global Environmental Epidemiological Network; and (iv) the WHO JECFA and JMPR network on chemicals in food. Networks of laboratories and specific subject networks (e.g. on deliberate acts) are being established.

What is its objective?
ChemiNet is designed to mitigate chemical incidents and outbreaks of illness of chemical etiology that are of international public health concern by:

- early detection, assessment and verification of outbreaks;
- provision of rapid, appropriate and effective assistance to respond to outbreaks; and
- contribution to long-term preparedness and capacity building.

How does it function?
ChemiNet functions as the chemical “arm” of GOARN. WHO/IPCS (together with WHO/CSR) coordinates international outbreak verification and response activities using resources drawn from within ChemiNet:

- In case of detecting events, ChemiNet provides a source of intelligence by informing WHO/IPCS of chemical incidents or outbreaks of illness that are of (potential) international public health importance. Events are reported to...

---

1 International Programme on Chemical Safety (IPCS) (WHO, ILO, UNEP)
2 GOARN when first established was designed primarily for outbreaks of infective aetiology, e.g. SARS, Ebola, avian influenza.
3 IOMC: Inter-Organization Programme for the Sound Management of Chemicals.
4 Organization for the Prohibition of Chemical Weapons.
5 UN Office for the Coordination of Humanitarian Affairs.
6 JECFA: Joint Expert Committee on Food Additives, Veterinary Drugs and Contaminants.
7 JMPR: Joint Meeting on Pesticide Residues.
8 Department of Communicable Disease Surveillance and Response (CSR).
WHO/IPCS via e-mail (ipcsALERT@who.int) or through any other official or unofficial communication channel.

- In case of assessing and responding to events, WHO/IPCS approaches ChemiNet members to provide additional information on the incident or outbreak and/or to volunteer their services, if needed (e.g. laboratory analyses, equipment for field investigations, to join an international response team).

- ChemiTeam may also draw on the expertise within ChemiNet to provide information on specific subjects (e.g. analytical techniques, diagnoses and treatment).

**How is it maintained?**

WHO/IPCS provides secretariat support to the network (e.g. to broaden ChemiNet, to facilitate information exchange, to support existing structures, to develop guidance, to organize meeting of network partners, etc.).

**What needs to be done?**

- To evaluate the human and technical resources of ChemiNet.
- To increase and broaden membership (e.g., geographical representativeness; multiple disciplines).
- To improve the ability/capacity of network partners to detect and verify chemical incidents.
- To identify network partners who are prepared to provide staff to important WHO field missions.
- To ensure human and financial resources for the further development, maintenance and management of ChemiNet.
- To ensure that network activities complement Member States in meeting their requirements under the revised International Health Regulations.

**In conclusion:**

(i) ChemiNet has been established as the chemical arm of GOARN; (ii) ChemiNet has not yet been fully formalised administratively and further work is needed in this regard (e.g. regular meetings of partners, staff); and (iii) ChemiNet builds on existing networks and needs further development.

**For further information**, please contact: Dr Kersten Gutschmidt (gutschmidtkgc@who.int) or Ms Joanna Tempowski (tempowskij@who.int), International Programme on Chemical Safety (IPCS), World Health Organization, or ipcsALERT@who.int.