



Emergency Medicine and Disaster Preparedness in a large Chemical Company

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Occupational Medicine
and Health Protection

BASF

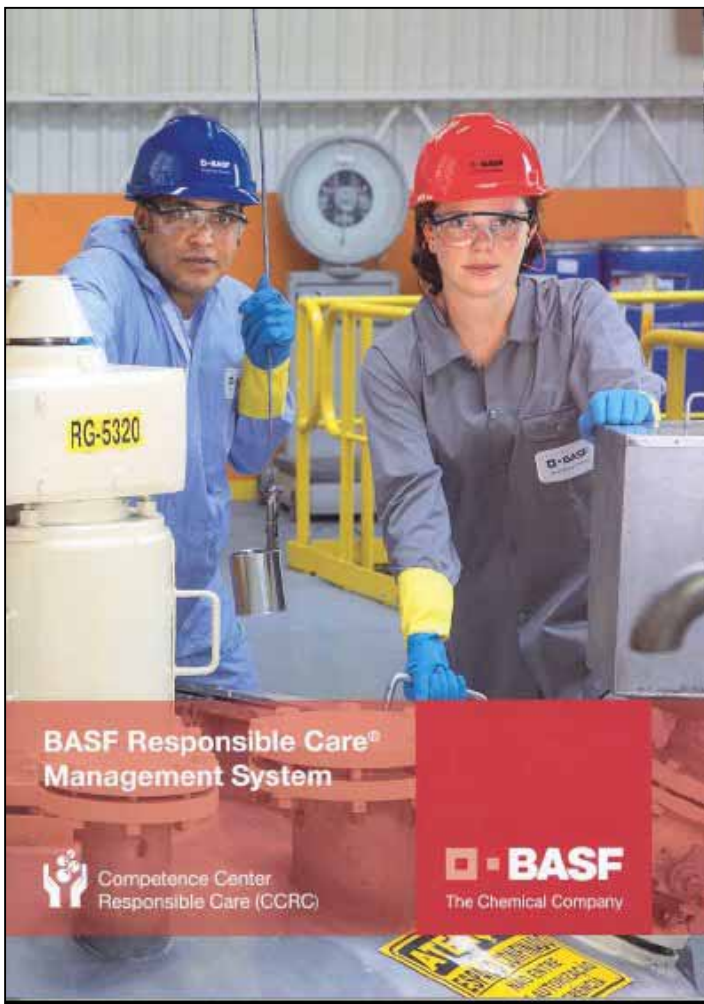
The Chemical Company

Occupational Medicine and Health Protection (OM & HP) at BASF

BASF is an international company whose approach to employee health protection is founded in the company's long-standing commitment to emergency preparedness, occupational medicine, health education, and health intervention programs.



The BASF Responsible Care® Management System



- Environmental Protection
- Process Safety
- **Emergency Response**
- Product Stewardship
- **Occupational Health**
- Occupational Safety
- Transportation and Distribution Safety
- Communication
- Security



The „Deming-Circle“ for OM & HP

Management-Review and Corrective Actions

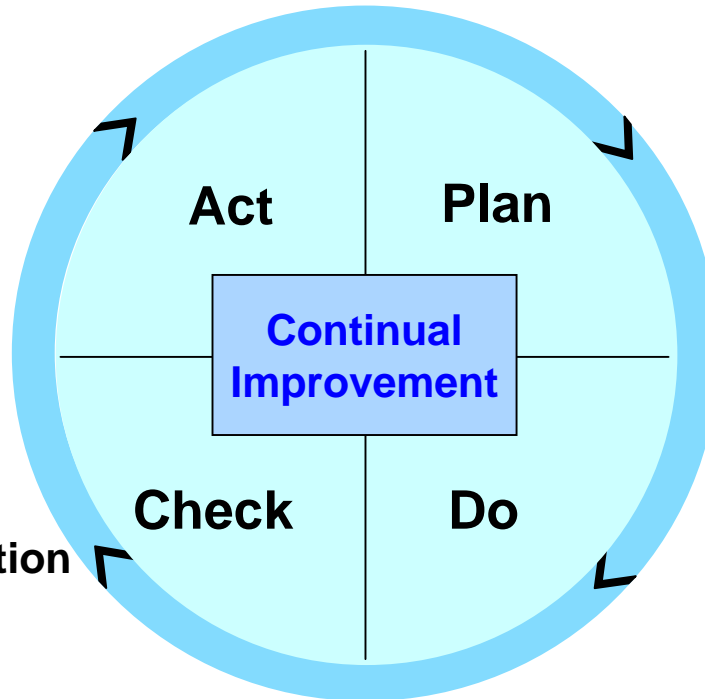
- Steering Committee Health
- Safety at Work Committee
- Forum: Environment, Safety, Health
- Benchmark "best practice"

Documentation and Evaluation

- Annual Report OM & HP
- Site-specific health reports
- RC Report

OM & HP Audits

- Screening + Full-Audits
- Plant visits and risk assessment



Law (e.g. Germany)

- Safety at Work Act (§ 3)
- Code of Social Law # VII

Corporate Policy

- Sustainable Development
- Responsible Care (RC)

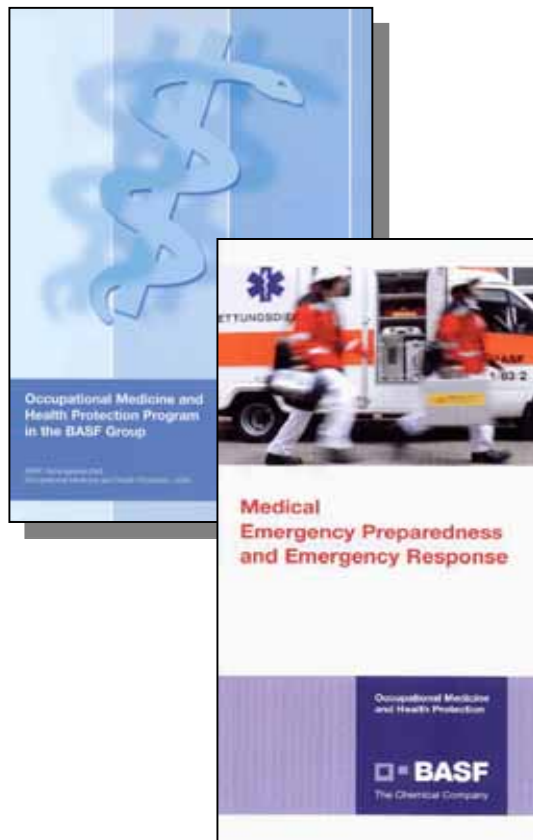
Corporate Directives

- BASF Responsible Care® Management

Occupational Medicine and Health Protection Program in the BASF Group

- Performance Standards
- Centers of Excellence

Occupational Medicine and Health Protection Program in the BASF Group



The BASF Occupational Medical and Health Protection Program refers to the following principles:

- Performance Standards to ensure “best practice”
- Centers of Excellence to provide “know-how” transfer (Support and guidance on site and during mutual visits; development of manuals and guidelines)
- Quality management with a global audit system

Occupational Medicine and Health Protection Audit System in the BASF Group



The OM&HP Audit is a systematic documented and periodic evaluation of the **General Health Hazard** (in four categories) and of the **OM&HP Performance** (in eight areas) at a given site, according to defined standards in the OM&HP Program.



Global OM & HP Organization



Ludwigshafen site (BASF Aktiengesellschaft)
(33,000 employees)

22 physicians (full time)
124 support personnel
(nurses, paramedics, technicians, etc.)

OM & HP Dept. reports directly to the Board

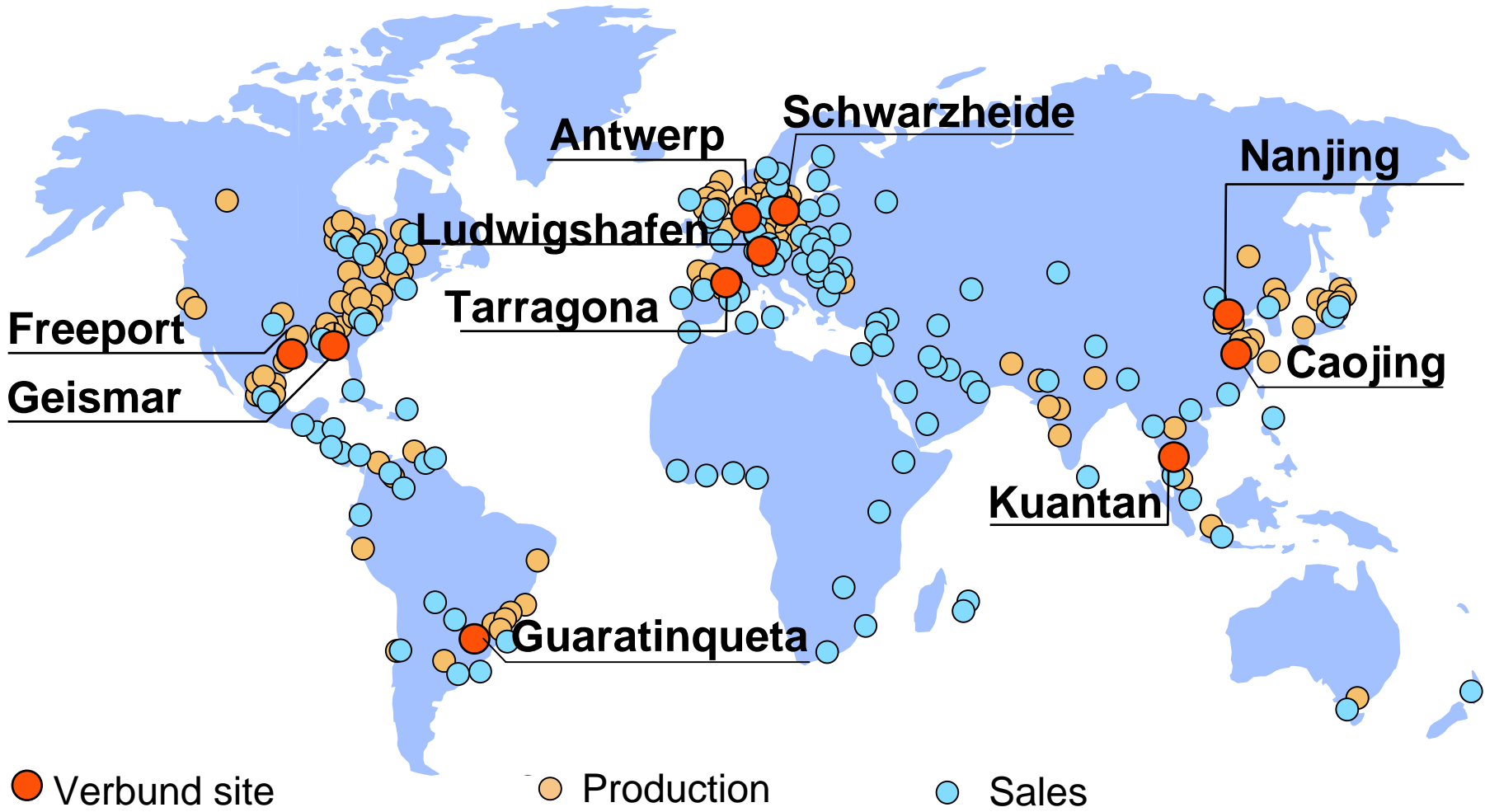


200+ production sites in 40+ countries
(62,000 employees)

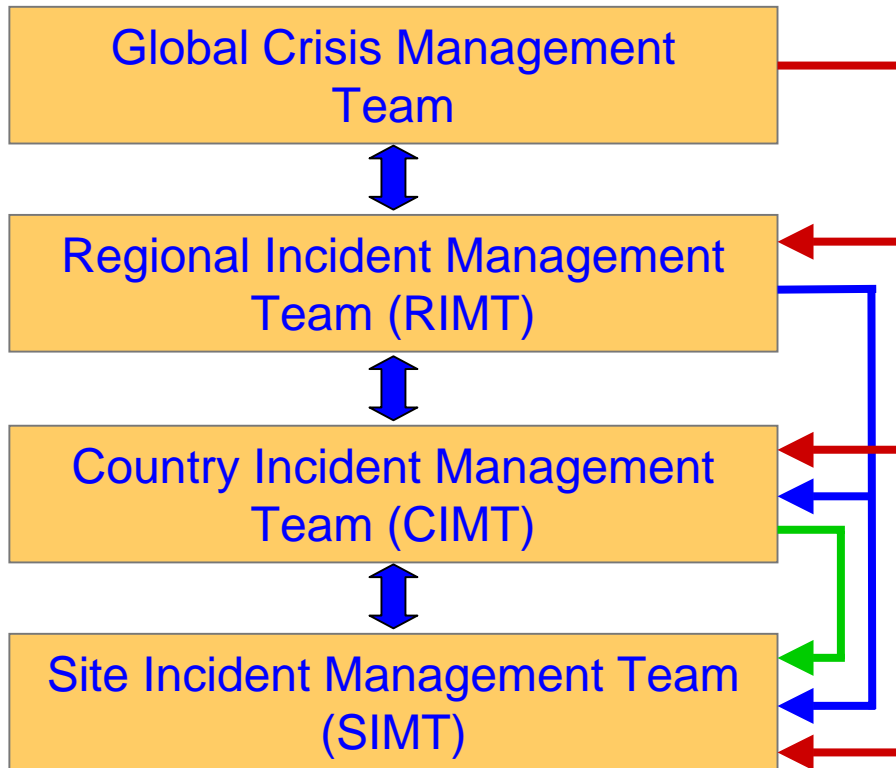
appr. 180 physicians (full time, part time,
BASF employed, contract)
appr. 100 support personnel

OM & HP units report to senior management

BASF sites



Incident and Crisis Management System



- Emergency plans
- Regular drills and exercises
- Steering Committee
- Cooperation with external forces
- Medical risk assessment of hazardous substances and recommendations for the respective treatment

Chemical Emergency Medical Guidelines

CHEMICAL EMERGENCY MEDICAL GUIDELINES



Instructions for

- first responders
- paramedics and doctors at the site
- doctors at hospitals/emergency departments
- patients/follow-up

Standardized guidelines developed by BASF experts

- for more than 30 substances or groups of substances of high risk
- four versions for
 - First aiders
 - Paramedics
 - Specialists in hospital
 - Patients
- adapted in content and phrasing
- translated into twelve languages

www.basf.de/arbeitsmedizin

Transport-Accident-Information- and Emergency-Response-System

- BASF is responsible for their products on major transportation routes (road, railway, barges and sea ships)
- BASF offers expertise to public Emergency Services and to customers in case of incidents/accidents
- BASF 24hrs Expertise for their products:
 - Ecotoxicological evaluation
 - Human toxicological evaluation
 - Waste water treatment after contamination
 - Plume modelling (water, soil, air)
 - Off-site HazMat best practise operations (technic, tactic)
- **Available 24/7/365 in Ludwigshafen through BASF Fire Department**
- **TUIS Hotline +49 621 60 43333**



Transport-Accident-Information- and Emergency-Response-System

- Europe:**
- **TUIS** (Transport Accident Information- and Support System) in Germany;
A voluntary assistance program of the Chemical Industry Association (VCI)
 - **ICE** (International Chemical Environment)
Founded by the European Chemical Industry Council (CEFIC)



- NAFTA:**
- **TRACER-Team**
(Technical Resource and Chemical Emergency Response)

South America: - **CECOM** out of Guaratingueta

Asia Pacific: A new system is emerging



Conclusion

- **Pre-disaster planning is extremely important !**
- **The key is: „Being prepared“ !**
- **Excellent education and regular drills are the most important elements to cope with an emergency situation !**



Thank you for your attention



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