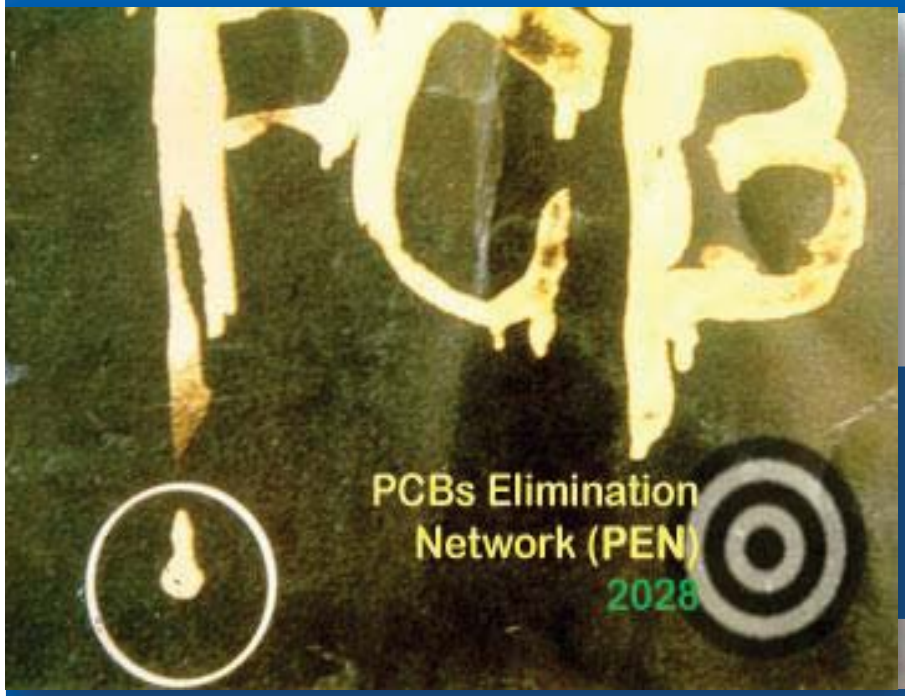
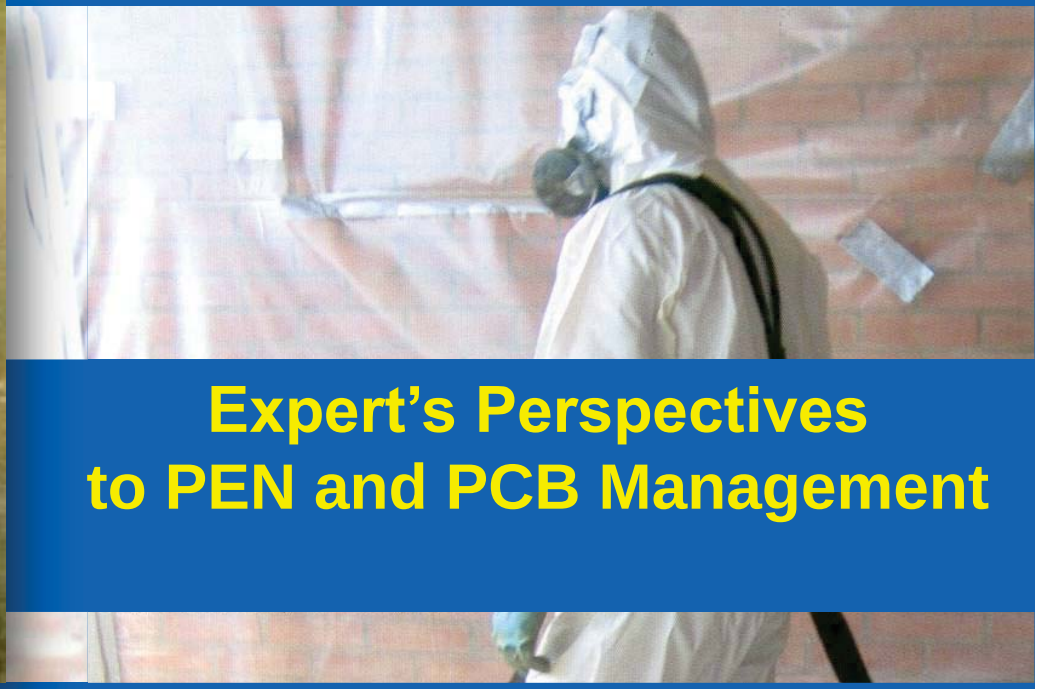
PCBs Elimination Network (PEN)





Expert's Perspectives to PEN and PCB Management

6 May 2013 – Ex COPs Side Event
Geneva / Switzerland

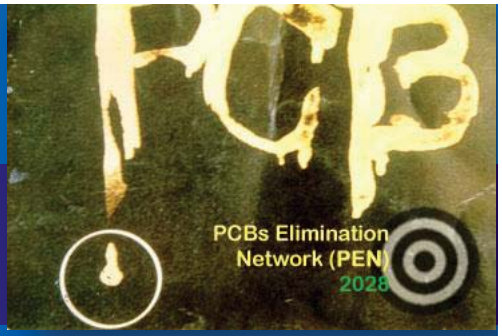
ETI
ENVIRONMENTAL TECHNOLOGY
INTERNATIONAL POP's & ASBESTOS EXPERTS

Stockholm Convention on persistent organic pollutants (POPs)

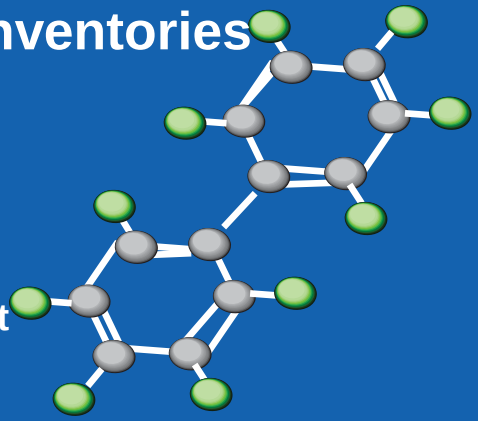
UNEP

ETI Umwelttechnik AG

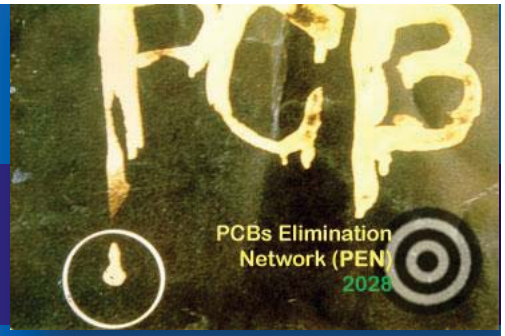
PEN 2013 - I



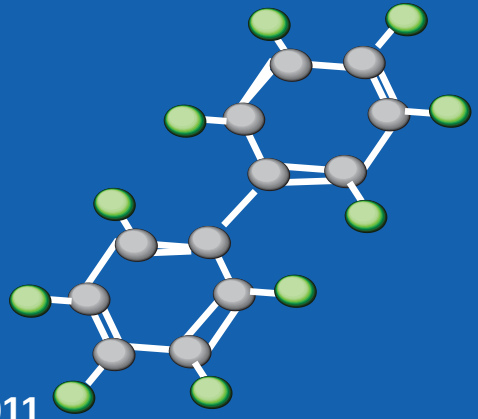
- Real start in November 2010, Ocho Rios Meeting
- First Inputs from the 4 Working Groups: Inventories, Maintenance, Disposal and Open Application
- Publication PEN Magazine 1st edition about Inventories in six UN languages
- Lessons learnt:
  - magazine was well received / appreciated
  - difficult to keep information actual due to dynamic development
  - translation/printing (too) expensive
  - → therefore proposal to keep it electronic only in future
- 2nd edition theme initially: Maintenance & Interim Storage



PEN 2013 - II

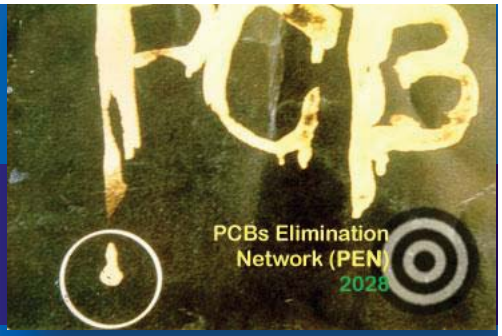


- **POPs Social**
  - Idea based on Facebook
  - the virtual world in the Net offers opportunities … but …
- **Development of Guidelines for "Inventory" (Jinhui Li) and "Maintenance" (Anna Ortiz)**
  - Basis: what is available and then to adopt, adapt and improve
  - → Unfortunately up to now most is just copy/paste
  - → SBC claims to keep the lead with Guidelines

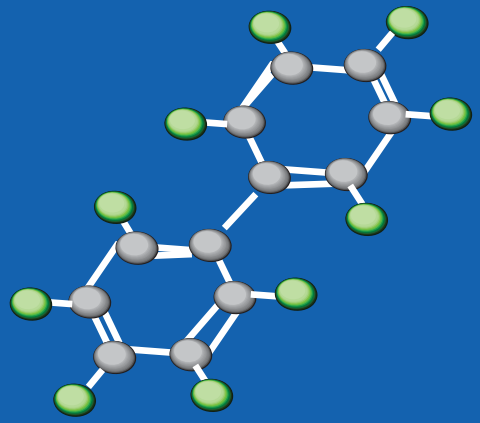


- **Development of first Factsheets about OA**
  - Drafts for two Factsheets (Industry and Private) ready since 2011
  - Photo Booklet Identify and Manage Open Applications in an Environmentally Sound Manner shall be ready for publication in autumn 2013

PEN 2013 - III



- **2011: COP-5 Decision to facilitate transition of leadership from SSC to UNEP Chemicals … but since:**
  - uncertainty if/how to proceed
  - most activities were on hold



- **What should be done to strengthen PEN:**
  - Leadership needs time
  - Acceptance by the COP Parties
  - Opportunities to provide assistance/know how in (regional) workshops
  - Funds for the PEN activities
  - AC needs:
    - motivated and ACTIVE Board Members
    - familiar with at least some of the PCB Topics
    - support by their nominating Regions/Countries/Organizations
- **Useful PEN outputs until next COP**

Disposal I

(Combustion & Non Combustion)

→ approved technologies are available
→ (too) high transportation costs
→ despotic hurdles regarding transboundary m.
→ consider pro & cons of mobile units

Disposal II

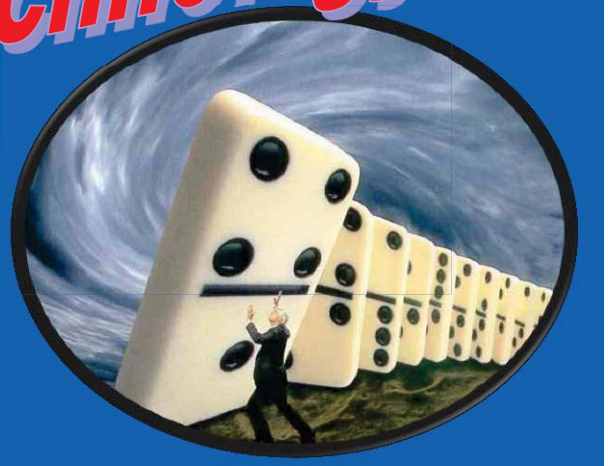
→ consider country tailored solutions
→ and problem related technologies (e.g. contaminated oils)
→ ensure correct understanding of terminologies / technologies

Therefore „Homework" first:

- Reliable PCB Assessment

- Choice of appropriate technology

- Priority Setting



Priority in all Regions

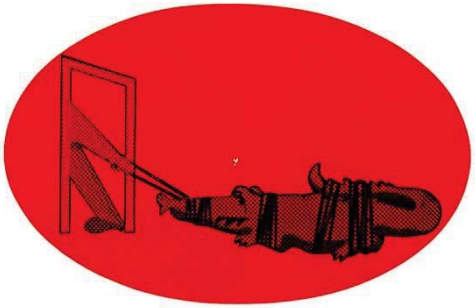
→ We need “Ccomplete” Inventories / Assessments

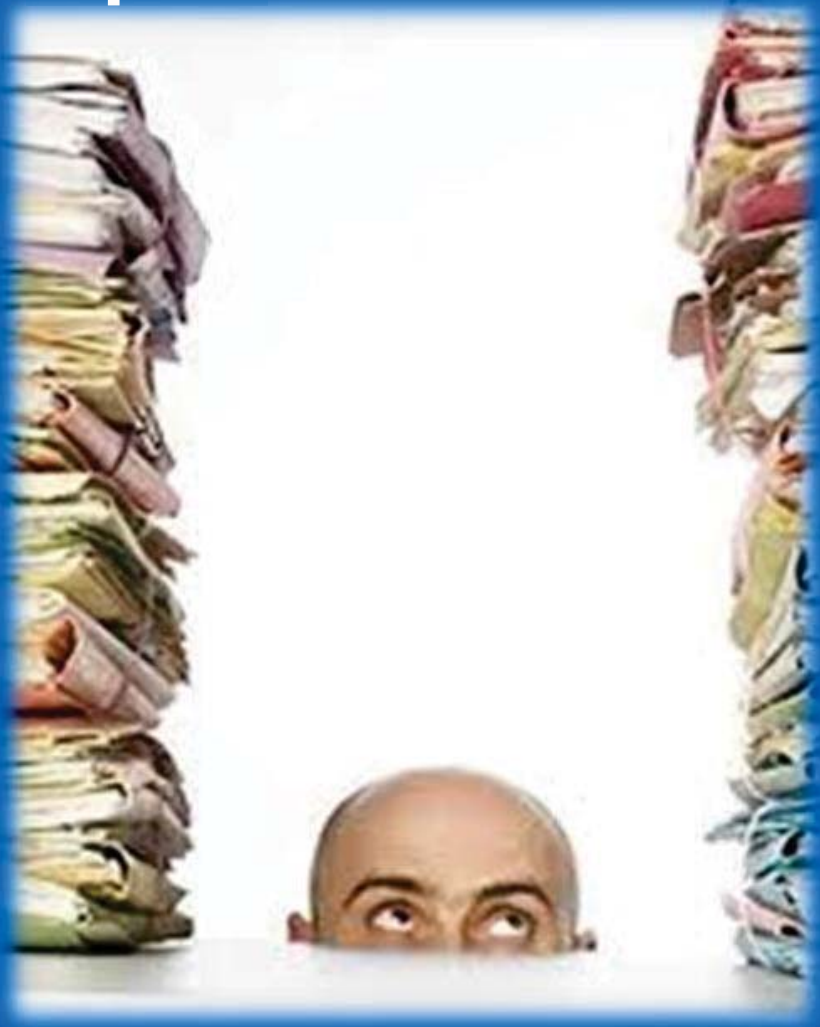
→ only fractions of equipment yet screened / analysed

→ PCB estimations → usually too high or too low

insufficient characterisation of type of problem

Disposal instead of more report with succes stories…





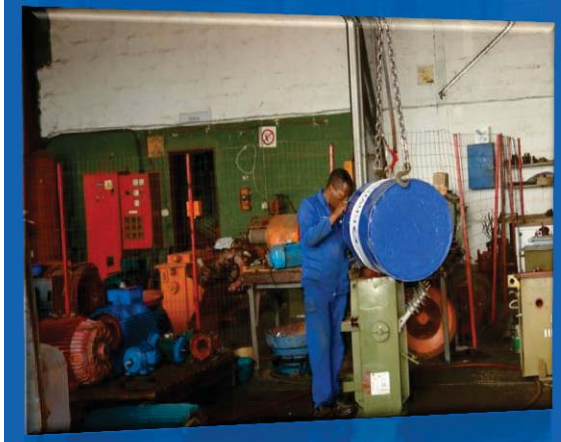
Cross Contamination

→ Consider Maintenance & Oil Recycling as a „Grey Zone“

→ Establish a mechanism to prevent cross contamination during O & M (filtering, etc.)

→ Establish system for easy recognition of PCB equip./oil

→ Ensure better O & H Management (Hygiene)



→ Consequently this needs more AR and Capacity Building

Awareness Raising & Capacity Building

→ **Adequate Communication on different (all) levels**

including Decision Makers AND Workers

Controlled Recycling and Disposal?

Where does the scrap go to?

... resulting in unintentional formation of PCDD/PCDF

There are plenty of Guidelines AND Regulations … what remains the problem?!

Unawareness

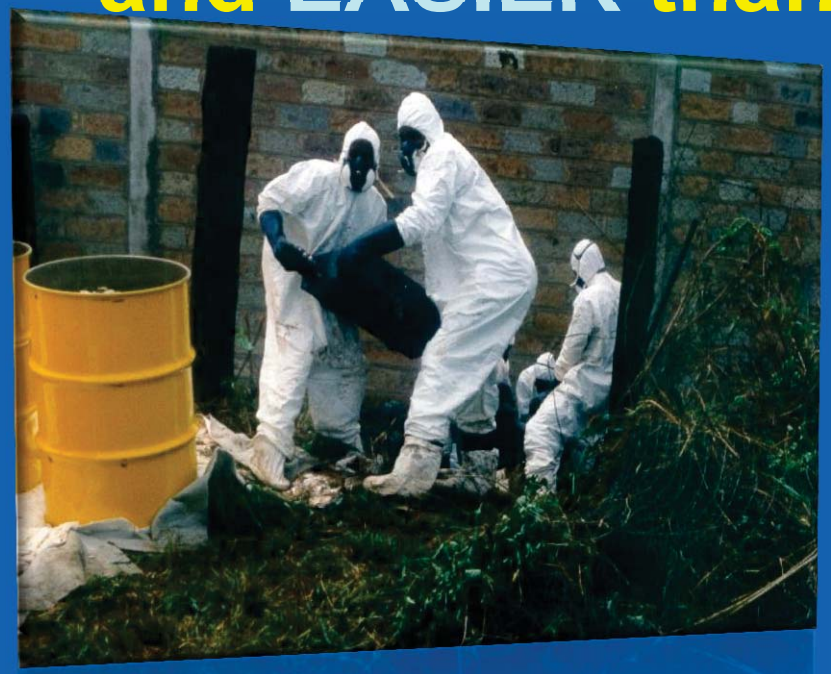
Missing Implementation and Control

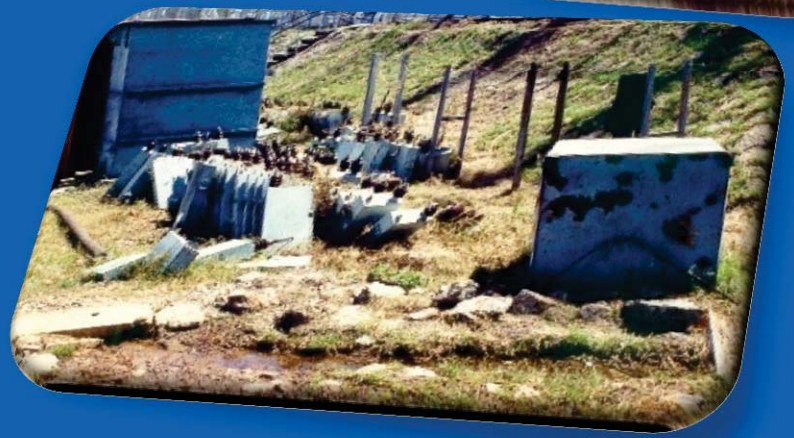
Ignorance

Implementation and Enforcement!

Even more important than Regulations:

Prevention is much CHEAPER and EASIER than remediation!





Overlapping of PCB and Asbestos Applications

SC, Annex A, Part II, PCB (f)

In lieu of note (ii) in Part I of this Annex, endeavour to identify other articles containing more than 0.005 % PCB

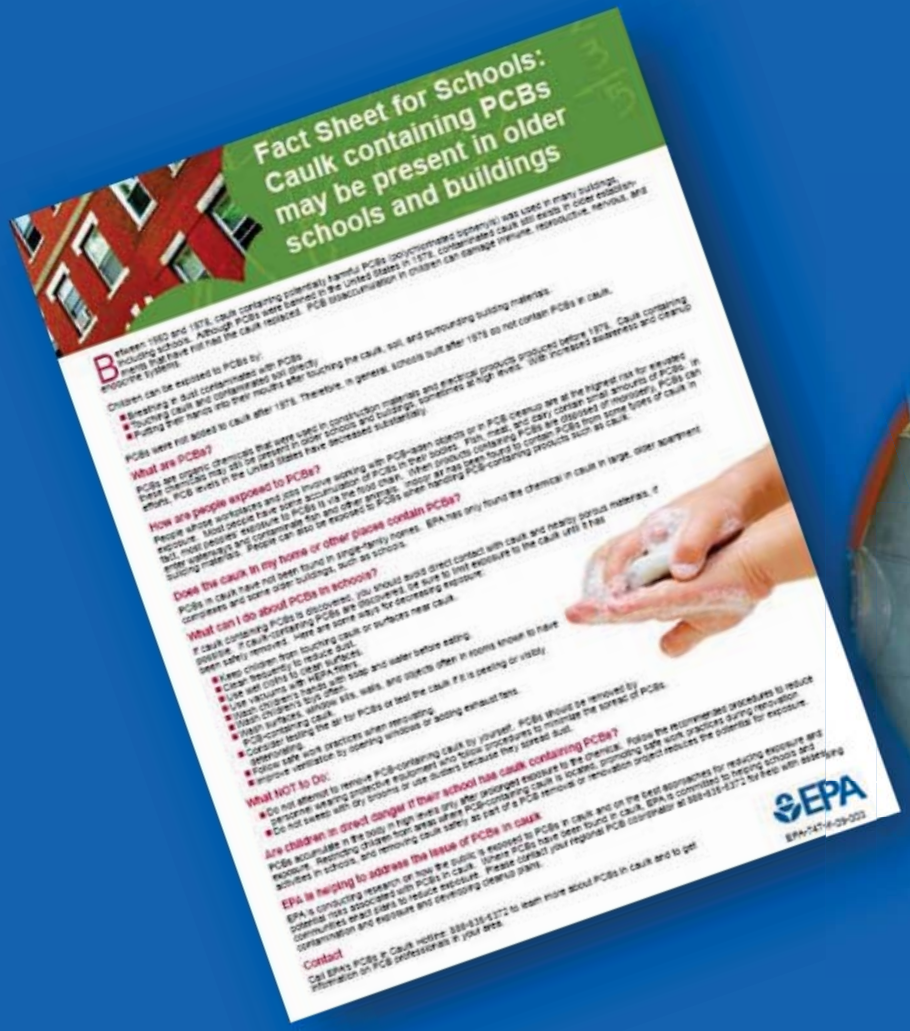
(e.g. cable-sheaths, cured caulk and painted objects) and manage them in accordance with paragraph 1 of Article 6.

Open Applications

- → Cables (impregnated, flame retardants)
- → Ceilings / Wood protection
- → Industrial and housing floors
- → Corrosion Protection Paint
- → Heating Oil Tanks and Radiators

→ Are such applications only a problem in Western Europe and USA?

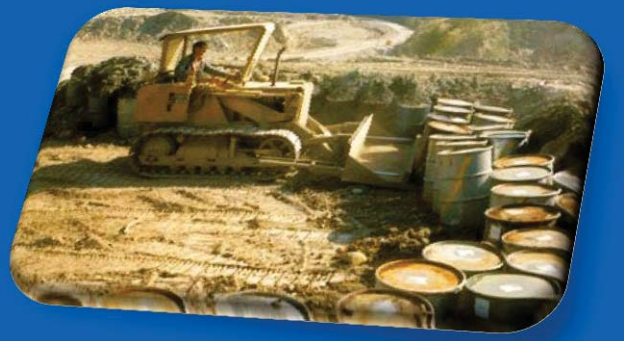
China considered Paint in their Inventory



8 Companies were dealing with PCB containing paint

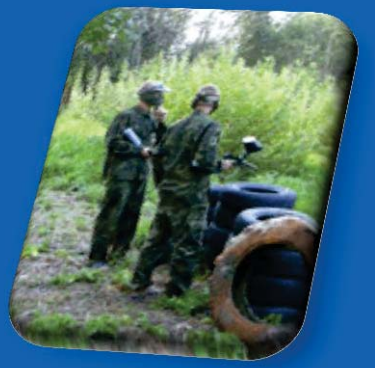
Summary:
Extract of main Sources of Diffuse PCB Pollution I

- Emissions from known, closed and open applications
- PCB from not yet identified former productions and applications
- Improper disposal of small capacitors and contaminated motor, transformer, hydraulic and lubricating oils
- Additive in corrosion protection coatings and paints
- Illegal and legal dumping
- Known landfill sites
- Use as flame retardant



Extract of main Sources of Diffuse PCB Pollution I

- Cables and cable casings/coatings
- Use of PCBs in the shipbuilding industry
- Buildings/Plants but also Floors from transformer substations or sites were PCBs used to be handled
- Use of PCBs as impregnating agent for wood
- Pesticide formulation
- Resh



- Military use of PCB containing products

Some Conclusions

- Approved Disposal & Treatment Technologies are available
- The costs are transparent & fair, however the transportation remains a costly and often risky issue
- Appropriate (not luxury) interim storages shall be available
- The current Focus should be on adaptation of existing inventories, prevention of further unnecessary cross contamination and unintentional formation of PCDD/PCDF and of course DISPOSAL!
- Therefore it is a must to further develop respectively adapt Guidelines and incorporate appropriate AR and CB Strategies considering all stakeholders and all levels of Workers and Management

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