

# How to integrate PCB management in your company

**Eng. Mario Mendoza**

Consultant

Chemicals and Waste Management Programme

Division for Planet

**Calls/ WhatsApp:** [+51 999 042 360](tel:+51999042360)

**E:** [mario.mendoza@unitar.org](mailto:mario.mendoza@unitar.org)



## National Implementation Plan (NIP) (Government)

- Measures for all POPs
- Measures to eliminate the use of PCB before 2025
- Measures to reduce the risk during the use.
- Measures to achieve an ESM of the PCB wastes before 2028

## National PCBs Management Plan (Government): strategies

- Preparation and implementation of national regulations
- Carry out a National Inventory of PCB
- Strengthen national capacities for the environmentally sound management of PCB

## Facilities PCB Management Plan

- Timetable for the elimination of PCB
- Identify PCBs in stock, waste, and infrastructure.
- Carry out Environmentally Sound Management of PCB
- Eliminate identified PCB
- Train workers to prevent risks of contamination to the environment and intoxication

**Stockholm Convention:  
Protect Human Health and the Environment from PCB**



## Objectives:

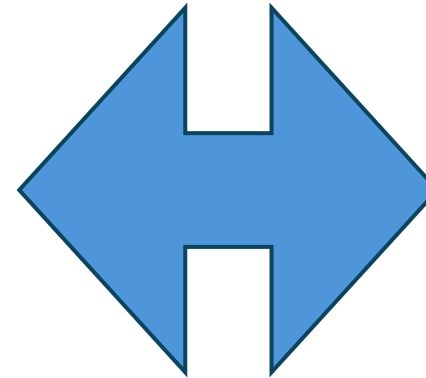
- **PCB phase-out**
- **Environmentally sound management of PCB throughout their life-cycle**
- **Integration of PCB management into the national environmental management program**

# National PCB Management Plan

## Government



- Preparation and implementation of national regulations
- Carry out a National Inventory of PCBs.
- Strengthen national capacities for the environmentally sound management of PCBs



## Complementary Elements

- Services companies: maintenance, storage, transportation
- Laboratories: analysis for of PCB
- PCB Elimination plans: service companies, in situ, treatment in the country, export for elimination

# Preparation and implementation of national regulations

- **Definitions**
- **Maxim concentration level**
- **Stakeholders' obligations**
- **Labeling**
- **Equipment manufacturing**
- **Equipment maintenance**
- **Maintenance companies' obligations**
- **PCB transportation**
- **PCB elimination**
- **Prohibit the voluntary dissolution**
- **Risk Control, and safety**
- **Contingency Plan**
- **PCB Trade (exportation, Importation, Transfer)**

# Carry out a National Inventory of PCB



- **Elaborate Technical guidelines.**
- **Report periodicity.**
- **Measures to control and penalties.**

## Services companies

The Government must promote the service activities for the related tasks for the PCB management as:

- PCB Screening,
- Transformer's maintenance,
- Refilling activities for reclassifying transformers,
- Internal, and external transportation
- Temporal storage
- Others...

# Strengthen national capacities for the environmentally sound management of PCB

## Laboratories

The Government must promote the operation of laboratories services for the Gas Chromatography analysis to confirm the presence of PCB, and its concentration.





## PCB Elimination plants

The Government must promote the operation of the PCB elimination Plants like Dechlorination mechanism inside the country.

They could be:

- Fixed plants
- Temporal plants
- Facilities for the exportation of PCB wastes

## Facilities PCB Management Plan

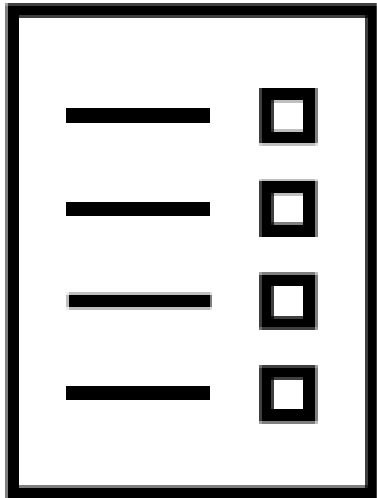
The FPCBMP is an environmental management instrument that enables stakeholders to identify and quantify their PCB stocks and wastes and assess different alternatives for PCB elimination.

This Plan contributes to controlling and reducing risks to human health and the environment associated with PCB stocks and wastes.

As a management instrument, the Plan may be updated, continually improved upon, and restructured based on results or evaluations.

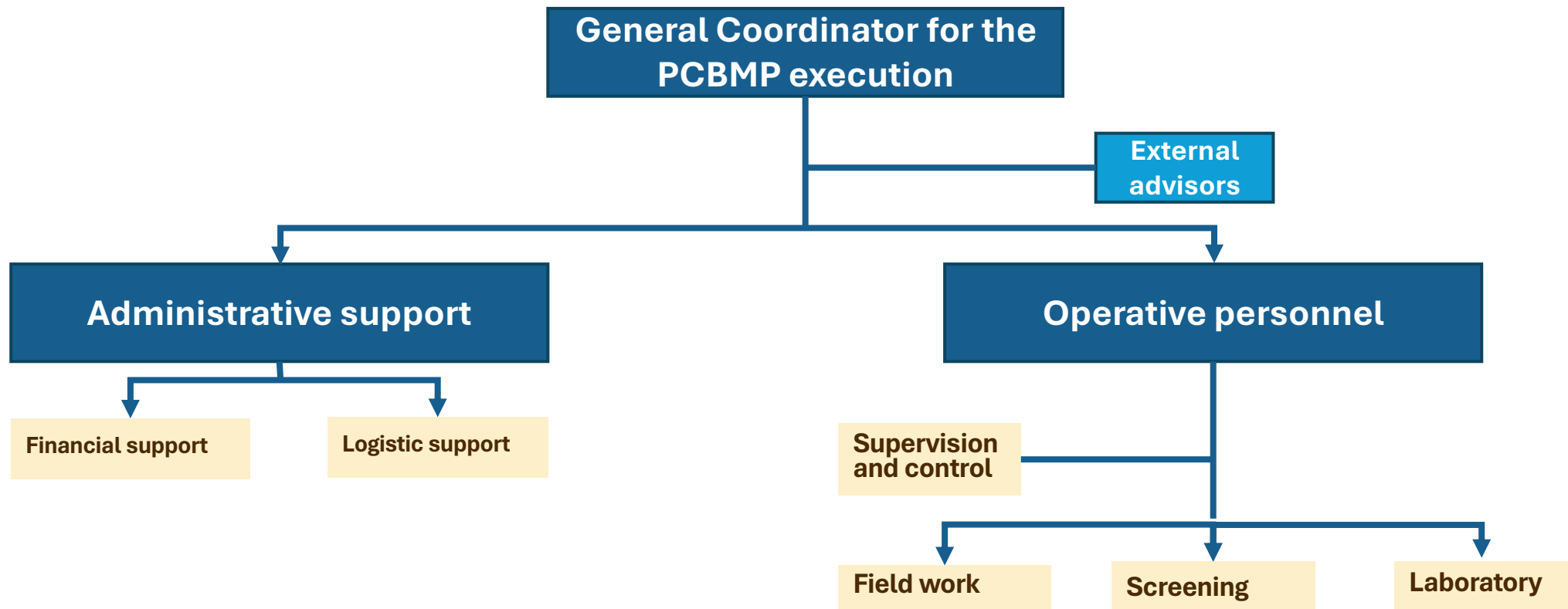


## Content



- Identification of probable sources of PCB
- Description of activities to be developed (inventory, storage, transportation)
- Risk evaluation for decision making and strategy to develop the inventory
- Treatment and elimination of PCB
- Procedures to PCB Management Plan and Contingency Plan
- Training activities
- Schedule & Budget
- Assigned responsibilities
- Monitoring&evaluation

## Organization



## Identify PCBs in stock, waste, and infrastructure

Identify source of PCB contamination

Sampling

Screening

Analysis GC

PCB Inventory

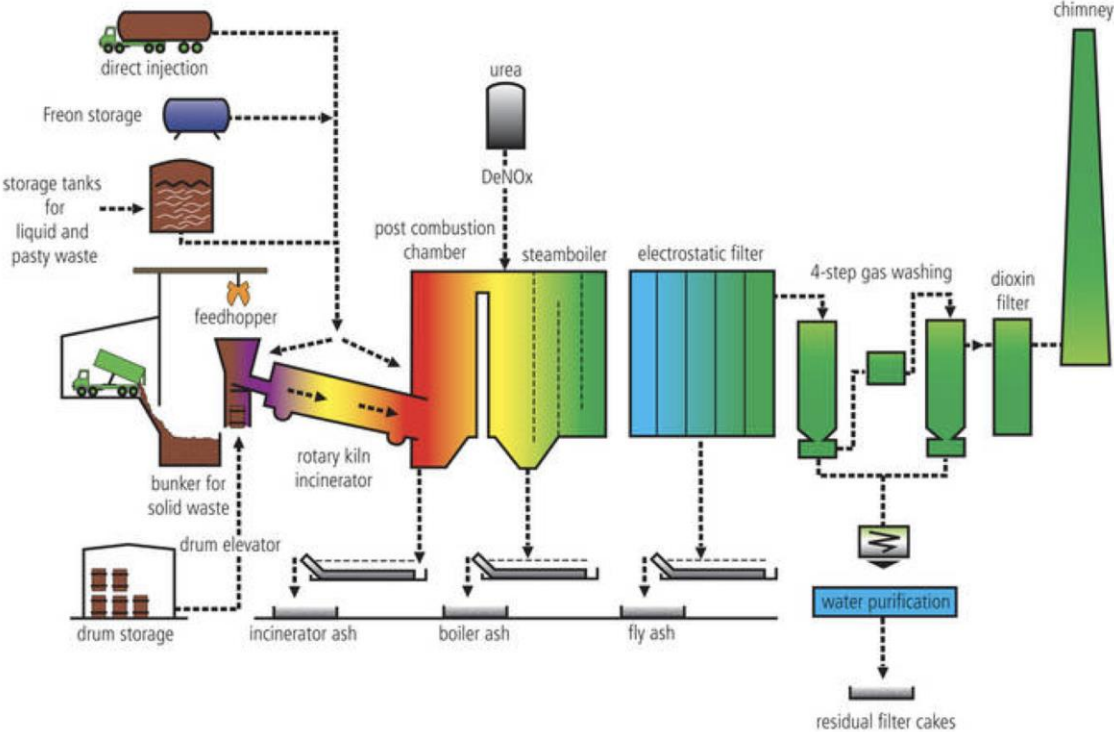


## Eliminate identified PCB

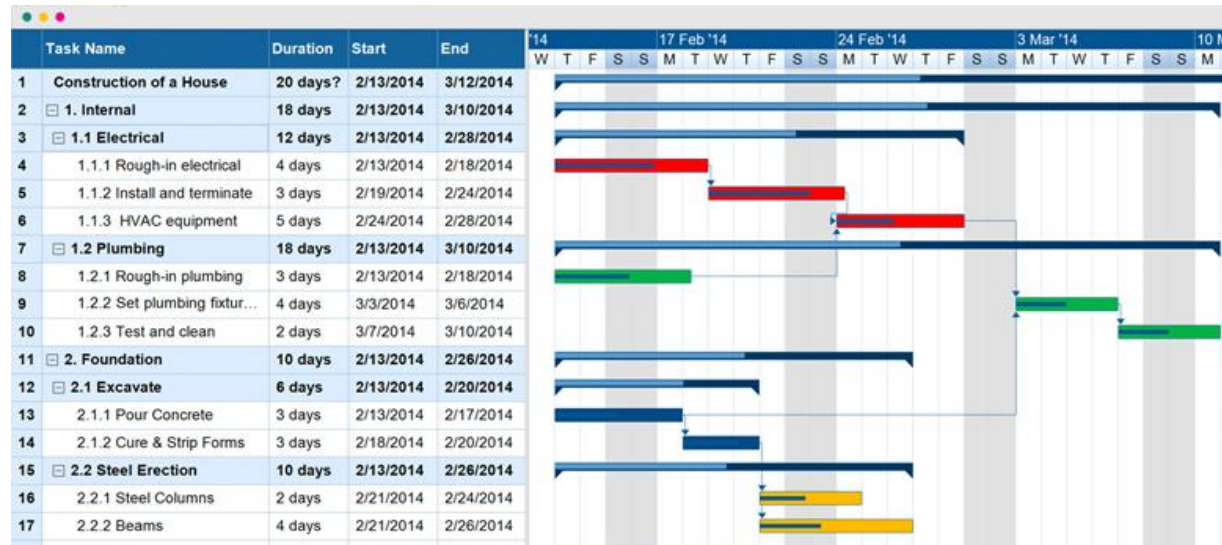
### Dechlorination



### Incineration



## Schedule & Budget



## Assigned responsibilities





## Assigned responsibilities



## Carry out Environmentally Sound Management of PCB

- Buy new equipment with the PCB-free certification.
- Repair and maintenance of PCB equipment applying all safety measures to control risks and avoiding cross-contamination, affecting the environment, and workers' health.
- Check the PCB content in dielectric oils before and after equipment maintenance.
- Labeling and register all PCB equipment (PCB Inventory updated).
- Establish control and security measures for the use of equipment containing PCBs.

- Do not sell equipment or oil contaminated with PCB with 50 or more ppm of PCBs.
- Use PCB-free oil for dielectric oil replacement.
- Apply principles of waste recovery, minimum transport of PCBs, and local PCB disposal preference.
- Export PCB equipment for treatment and/or destruction in accordance with the Basel Convention.
- Carry out an oil decontamination treatment with environmentally sound and approved technology.

# Train workers to prevent risks of contamination to the environment and intoxication

- The company must include in the PCBs Management Plan an annual training program for workers in order to avoid accidents and reduce risks for workers and operators of equipment with PCBs.

# Thank you!

**Eng. Mario Mendoza**

Consultant

Chemicals and Waste Management Programme

Division for Planet

**Calls/ WhatsApp:** [+51 999 042 360](tel:+51999042360)

**E:** [mario.mendoza@unitar.org](mailto:mario.mendoza@unitar.org)

