# Notable Toxins AP Environmental Science

# Lead

- Where Found In Environment
  - •Old pipes, paint and old gasoline. Batteries
- Health Impacts
  - Neurotoxin → brain damage and kidney problems
- Important Info
  - Babies and toddlers can ingest paint chips in old houses and from toys

# Mercury

- Where Found In Environment
  - •Coal burned→mercury
    airborn→rain→rivers→ocean→bioaccumulati
    on & biomagnification→tuna and
    swordfish→humans
- Health Impacts
  - Same as lead
- Important Info
  - Minimata Bay, Japan thousands died from Mercury dumped in Bay

### Asbestos

- Where Found In Environment
  - Insulation in older buildings
- Health Impacts
  - Lung Cancer (Mesothelioma) and scarring of the lungs (Asbestiosis)

### **PBDE**

- Where Found In Environment
  - Fire-retardant in computers, cars, TVs, plastics, pillows, mattresses etc.
- Health Impacts
  - Possible endocrine disruptor
- Important Info
  - Has been found in human breast milk

### **DDT**

- Where Found In Environment
  - Top predatory birds from persistent DDT/DDE
- Health Impacts
  - Birds' eggs crack
- Important Info
  - Banned in the U.S.
  - One of the dirty dozen

### PCB

- Where Found In Environment
  - Industrial chemical. Now banned, but persists a long time (POP) Arctic circle
- Health Impacts
  - Neurotoxin. Same as lead
- Important Info
  - Same as DDT

# Bisphenol-A (BPA)

- Where Found In Environment
  - Plastics, lining of food cans, receipt tape.
- Health Impacts
  - Probable endocrine disruptor
- Important Info
  - CA law now bans it in baby products

## Cadmium

- Where Found In Environment
  - Rechargable batteries
- Health Impacts
  - Neurotoxin-same as lead
- Important Info
  - Can leak from batteries in a landfill into groundwater below the landfill.

### Aldicarb

- Where Found In Environment
  - Pesticide used on crops
- Health Impacts
  - Possible teratogen
  - Causes respiratory problems, nausea and headaches
- Important Info
  - One of the most toxic pesticides legal in the U.S.

### Atrazine

- Where Found In Environment
  - Fertilizer
- Health Impacts
  - Endocrine disruptor
  - Causes amphibians to become hermophrodites or sexually impaired.
- Important Info
  - Very common. Manufacturer says no problem

### **Phthalates**

- Where found in the Environment?
  - Soft plastic children's toys and many cosmetics
- Health Impacts
  - Hormone-disrupting chemical. Birth defects, breast cancer
- Important Info
  - Banned in Europe, but remains widespread in US.
  - Banned in CA and WA in children's toys