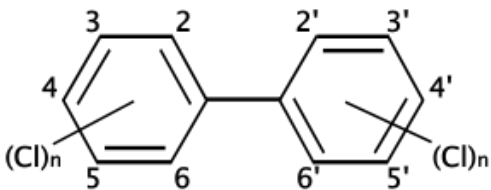


PCB Handling Guidelines

Phone: 519-253-3000 Ext. 3523 • E-mail: ccc@uwindsor.ca • Web: www.uwindsor.ca/ccc
Location: Essex Hall / B-37 • Hours: 8:30 am to 4:30 pm (M-F)

WHAT ARE PCBs

Polychlorinated biphenyls (PCBs) are industrial chemicals that are odorless, clear to yellow in colour, and are highly toxic to organic organisms. Production of PCBs in North America began in 1929 and ended in the late 1970s. They were mainly used in electrical equipment as a dielectric for capacitors, but also used in various other products such as coolants, adhesives and paints. PCBs were discontinued from production in North America when it became apparent of their high toxicity to living organisms. They can easily penetrate the skin and natural rubbers, including latex gloves. PCBs are very stable compounds and require extensive chemical processes to be completely destroyed.



CANADIAN LEGISLATION

Canada has never produced PCBs, however they were widely used in this country. Canadian legislation allows owners of PCB equipment to continue using PCB equipment until it is no longer operational. PCBs are not allowed to leave Canada and must be destroyed in this country. If PCB waste cannot be destroyed immediately, they are allowed to be stored in a restricted area. Environment Canada requires PCB equipment to be labeled with government serialized labels to track the use and disposal of PCB material.

HOW TO IDENTIFY PCB CONTAINING MATERIALS

Common PCB containing electrical equipment are **CAPCITORS**, **BALLATS** and **HIGH VOLTAGE TRANSFORMERS**. PCB's were sold in North America under the name **AROCLOR**. Following the name AROCLOR was a 4-digit code, where the last two digits indicated the percentage of chlorine by weight contained in the PCB product. For instance, a PCB product with 40% PCB containing material might have read, AROCLOR 3040.

High Voltage Transformers containing PCBs were sold under a variety of trade names. See table below for reference.

Apirolito (Italian)	Aroclor	Asbestol	Askarel	Chorextol
Chorinol	Clophen (German)	Diaclor	DK (decachlorodiphenyl)	Dykanol
Elemex	Eucarel	Fenclor (Italy)	Hylvol	Inerteen
Kaneclor (Japan)	Montar	NoFlamol	Phenoclor (France)	Pydraul
Pyrалene	Pyroclor	Saf-T-Kuhl	Santotherm FR (Japan)	Sorol
Therminol FR				

Also, a “Type Number” beginning with the letter “L” indicates that a transformer is PCB contaminated. For example: **LFAF**, **LFAN**, **LFWN**, **LNAF**, **LNWN**.

Any suspected PCB contaminated material at the University of Windsor is to be referred to the Chemical Control Centre’s Environmental Protection Service. A suitable and complimentary test will be conducted to determine the presence of PCBs.

PROPER PROTECTIVE EQUIPMENT

Only trained individuals in handling PCB containing materials should handle this chemical. Extreme caution should be taken as PCBs easily enter the skin. Therefore when working with PCBs all skin must be protected by wearing **nitrile gloves**, **boots**, **disposable coveralls**, **aprons** and **eye protection** as necessary.

LABELLING AND STORAGE OF PCB MATERIAL

All PCB material should be properly labeled while it is in-service or is in safe, controlled storage at the University of Windsor. There are four different labels for PCB equipment. Serialized labels issued by Environment Canada are used to track PCB containing materials (Figure 1 – Large Item and Figure - 2 - Smaller Items). In addition, general warning labels are used to warn individuals of the presence of PCBs (Figure 3) or contaminated equipment (Figure 4). The University of Windsor has a PCB storage facility located at Maintenance Services (2601 Union Street). Only trained and authorized personnel are allowed access to the PCB storage facility.

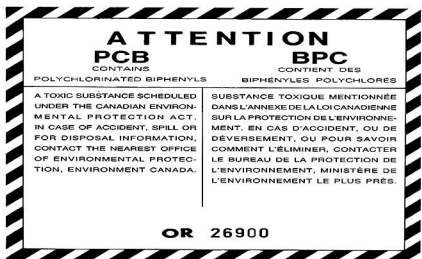


Figure 1



Figure 2

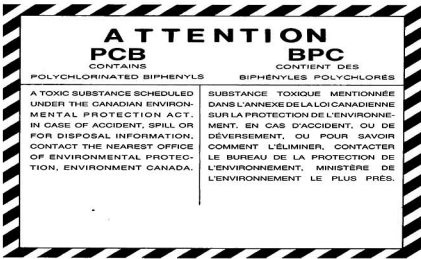


Figure 3



Figure 4

PCB SPILL RESPONSE

All PCB spills are to be referred to the Chemical Control Centre, please see contact information at the top of this document.

REFERENCE

University of Windsor’s Management of Polychlorinated biphenyls (PCBs) (Policy EHS-2008-01)