

Alberta Environment's Approach to Pollution Prevention Initiatives

Introduction

Alberta Environment encourages industry to practice pollution prevention (P2) to reduce or eliminate pollution, environmental disturbance or waste at the source, rather than dealing with them after they have been created.

Although never being formalized in department programs or policies, P2 has always been a part of environmental protection in Alberta. Environmental benefits, such as reduced pollution and a healthier environment, and financial benefits, such as reduced operating and liability costs, make P2 an effective approach to dealing with industries or activities that are not heavily regulated.

Alberta Environment's P2 approach is based on a working definition for pollution prevention; focuses on small to medium sized operations; is guided by operational principles and uses strategies that support the core businesses of the department.

Definition

The proposed definition of P2 for Alberta Environment is based on the Canadian Council of Ministers of the Environment (CCME) definition, which has been adopted by several Canadian jurisdictions, and is similar to Environment Canada's definition. This ensures consistency between P2 initiatives in Alberta with those of other jurisdictions.

Alberta Environment's proposed P2 definition is:

The use of processes, practices, materials, products or energy that avoid or minimize the creation of pollutants and waste or environmental disturbance, and reduce risk to human health or the environment.

Alberta Environment's P2 initiatives will focus on:

- Substances of concern
- Materials and feedstock substitution
- Operating efficiencies
- On-site reuse and recycling
- Training
- Purchasing practices
- Product design
- Equipment modifications
- Product reformulation
- Process changes
- Clean production
- Avoidance of cross-media transfer of pollutants or waste

Program Statement

Alberta Environment recognizes the importance of the preventative approach as a complement to environmental regulations. Pollution prevention is Alberta Environment's preferred approach for industries or activities that are not heavily regulated, but whose actions may have potential adverse environmental effects. Alberta Environment's P2 efforts will target small- and medium-sized operations. It will encourage and, where appropriate, facilitate voluntary P2 initiatives.

Although the focus will be on voluntary initiatives, Alberta Environment may consider initiating mandatory P2 activities.

Design Criteria of Alberta Environment's P2 Initiatives

Several principles will guide Alberta Environment's P2 initiatives. Those principles recognize and respect existing environmental protection efforts in Alberta.

Alberta Environment's P2 initiatives will complement existing department programs.

Alberta Environment has an effective environmental management program in place; P2 initiatives will not replace the need for typical approvals, and the monitoring and reporting that is associated with them. The department will look for opportunities where P2 may be a useful complement to existing programs.

Alberta Environment will attempt to make its P2 activities compatible with those of Environment Canada.

Having P2 expectations that are similar to those of Environment Canada will increase the incentive for companies to voluntarily practice P2. In addition, if the federal Environment Minister exercises his/her authority to require P2 plans, Alberta Environment will accept These P2 plans as long as they meet the *Canadian Environmental Protection Act* requirements.

Alberta Environment's P2 efforts will focus on minimizing or avoiding the creation of pollutants or waste.

By focussing on the reduction of waste at the source, Alberta Environment's P2 initiatives will be more compatible with initiatives done by the Canadian Council of the Ministers of Environment, Environment Canada and other jurisdictions. In addition, Alberta Environment will consider off-site recycling to be P2 only if it is part of a wider industrial ecology initiative.

Industrial ecology encourages facilities to maximize energy efficiency and resource use, minimize pollution, and eliminate waste. Through industrial ecology, the wastes of one facility become raw material for another.

Alberta Environment's P2 efforts will not reduce pollution in one medium by transferring it to another medium.

Moving the problem from one area to another is not acceptable. For example, using a process or technology that removes a cleaning solvent emitted to a water body can be considered P2 if the solvent is then recycled on site or turned into a useful by-product. Removal of the solvent from the water effluent and disposal in a landfill is not an acceptable P2 activity.

Alberta Environment will promote P2 activities within the Alberta government.

Pollution prevention will be considered in activities, such as purchasing policies and efforts to reduce energy consumption, undertaken by the Government of Alberta.

Implementation Strategies

Alberta Environment will work with stakeholders to develop and implement P2 activities.

Because P2 is site specific, Alberta Environment will work with companies to help them identify which initiatives suit their operation best.

Alberta Environment will put its initial focus on voluntary action but may consider mandatory P2 planning for some activities at a later date.

Currently, most P2 activities are voluntary, however, Alberta Environment may explore mandatory P2 regulations as necessary. Pollution prevention regulations in other jurisdictions can serve as a guide.

Alberta Environment will work with industry associations.

Industry sectors that are not closely or directly regulated by Alberta Environment have the potential to be missed by P2 initiatives. Partnerships with industry associations provide a good opportunity to reach small- and medium-sized companies.

Alberta Environment may use pilot projects to test the practicality of P2 initiatives.

It is appropriate to test approaches before making a full-scale commitment to them. Likely participants would be firms that have good track records. The pilot programs will be developed as necessary.

Alberta Environment may enter into partnerships with Environment Canada and/or industry associations on specific P2 initiatives.

Partnerships between the province and the federal government ensure that P2 expectations of industry are similar, making it easier for companies to practice pollution prevention initiatives.