

Pollution Prevention (P²) Planning

A Mix of Environmental Compliance and Pollution Prevention Activities

Important P² Planning Principles

ENVIRONMENTAL COMPLIANCE	BEYOND ENVIRONMENTAL COMPLIANCE
<ul style="list-style-type: none">• Ensure that all environmental regulatory issues affecting facility processes and products have been identified.• Require that any existing corporate environmental health and safety policies and procedures have been incorporated into the pollution prevention plan.• Assure that a system is in place to maintain all required environmental records and documentation.• Ensure that environmental performance is measured and the results are appropriately disseminated to employees and interested parties.	<ul style="list-style-type: none">• Verify that facility-specific policies are in place and utilized to manage environmental health issues.• Support the presence of adequately trained personnel to carry out facility-specific environmental issues.• Seek to ensure that adequate resources and support are provided to facility management staff to address environmental issues.• Seek to establish appropriate management and oversight of facility specific environmental issues.

The Scope of the P² Plan – It is important to understand that a **P² Plan** may cover the activities of many facilities in a project or in the alternative be intended to manage a specific facility process, personnel, program, practice and/or procedure. In determining the scope of the **P² Plan** it is important to determine whether:

1. The entity or activity is currently being managed in accordance with an existing **P² Plan**;
2. The **P² Plan** will have the necessary control over the entity or activity such that it can or should influence behavior; and
3. The entity or activity to be managed by the **P² Plan** is an integral part of the project or facility's products, services, or activities.

Situation 1 – Scope of a Facility Specific P² Plan. Facility manufactures hard soaps. The soap products contain high quality and rare ingredients, but the manufacturing process is basic. The process combines tallow (animal fat) and coconut oil in equal measures. Color and water are added (15% of total volume) is added, and then the ingredients are mixed, rolled, dried, and pressed. Fragrances are added to the cold-pressed basic soap before it is milled.

Site has a number of ancillary plant facilities and equipment, including an auxiliary diesel power plant, a boiler, which runs on heavy fuel oil and a wastewater treatment plant that it shares with an adjoining potato chip factory.

Even though the wastewater treatment plant is shared with another entity, it should be included in the scope of the **P² Plan** along with the other ancillary plant facilities and equipment because there would be a major environmental impact if the wastewater treatment plant failed.

Situation 2 – Scope of a P² Plan for Master Planned Commercial/Industrial Development.

While it might seem difficult to develop a **P² Plan** for a number of different facilities, operations and processes, it would simply require that the master plan seek to support the effectiveness of individual facilities, operations and **P² Plans** with the thoughtful integration of project/common area infrastructure components.

Critical Success Factors in Developing a P² Plan

1. **Use Existing Structures and Procedures That Have Proven Value.** Identify the procedures and practices that are in place and working. These may be in the area of training, hazardous materials management, document control, emergency response plan or other area. Be sure to use the existing processes that work well now. Examine other parts of the existing system, which may not be working well and see how they can be improved.
2. **Secure Top Management Support and Commitment.** Top management can demonstrate their support by: including frequent statements to employees and the public of their personal expectations for the company's environmental performance as well as regular requests for information on the status and effectiveness of the company's P² Planning activities.

3. **Set Realistic Objectives and Targets.** The **P² Plan** must establish objectives and targets, but the standard does not require that the objectives and targets be ambitious or even difficult to achieve. Set objectives and targets at a level that challenge your facility, but that are realistic and achievable. The objectives and targets should be specific and measurable so that your facility can make regular progress.
4. **Clearly Assign Roles, Responsibilities, and Authorities.** Roles need to be assigned to the “right” people, such as personnel in a position to exert influence. Typically, operations managers have more direct control than environmental managers. Staff management, corporate environment health and safety groups should be a source for specific expertise. Roles, responsibilities and authorities should be specific and clear. Detailed and explicit job descriptions are also useful. The greater the organizational distance between the people having the most knowledge of environmental concerns and the individual with the principal environmental accountability (i.e., CEO, facility manager) the less likely it is that the environmental management function will have the authority and visibility to achieve its mission.
5. **There Is No Finish Line.** The implementation of the **P² Plan** is an ongoing and continuous effort. After you have evaluated your current operations, procedures, and processes; after you have developed your **P² Plan** policy, procedures, and tools; even after your facility’s **P² Plan** or environmental management system has been certified . . . your work is not complete once your system is operational. Changes in circumstances at your facility as well as environmental developments outside the company will require you to continually maintain and refine your plan or system.

The P² Plan Outline

I. Environmental Policy

1. Develop a documented statement that establishes basic corporate goals and guides decision making with respect to environmental issues specific to its activities, products, and services.

II. Planning

1. Identify, evaluate, and prioritize, in a systematic manner, the environmental aspects associated with its activities, products, and services.

2. Identify legal and other requirements.
3. Develop documented environmental objectives and targets that are to be achieved. Specify actions to be taken to achieve the objectives and targets set.

III. Implementation and Operation

1. **Structure and Responsibility.** Organization has to align its organizational structure to support effective environmental management by establishing clear, documented roles, responsibilities, and authorities. Management must also provide adequate resources for this effective management and appoint a management representative to oversee the **P² Plan** and report on performance.
2. **Training, Awareness, and Competence.** The organization must adequately train its personnel to be aware of, and capable of accomplishing, their assigned roles and responsibilities within the **P² Plan**.
3. **Communication.** The organization must have in place a system of communication that will ensure that those within the organization are kept informed regarding the **P² Plan** and environmental issues associated with the organization's operations, and that communication from external interested parties is received and handled according to established procedures. The organization must also decide whether and how, to communicate its significant environmental aspects to interested parties, and that this decision be recorded.
4. **Environmental Management System Documentation.** The organization needs to maintain documented information that describes the core elements (roles, responsibilities, authorities and programs) of the **P² Plan** and includes references to associated documentation.
5. **Document Control.** Document control procedures need to be established and maintained.
6. **Operational Control.** The organization has to identify specific operations associated with its significant environmental aspects and plan these operations to ensure that they are managed in accordance with the established environmental policy and the organization's environmental objectives and targets are met.

7. **Emergency Preparedness and Response.** The organization must develop procedures for identifying and managing emergency situations. Such procedures must be periodically tested, reviewed and revised, where appropriate after the occurrence of accidents or emergency situations.

IV. Checking and Corrective Action

1. **Monitoring and Measurement.** The organization must have documented procedures for monitoring and measuring its operations and activities that have significant environmental impact. The intent is to track environmental performance, assess effectiveness of operational controls, and evaluate achievement of environmental objectives and targets and compliance with regulatory requirements.
2. **Nonconformance and Corrective and Preventive Action.** The organization must have a process that includes defined roles, responsibilities, and authorities to investigate and address any nonconformances within the **P² Plan**.
3. **Records.** Records management procedures need to be established and maintained to ensure that records that support the **P² Plan** are retained, accessible, and maintained.
4. **P² PLAN audit.** Programs and procedures for auditing the **P² Plan** need to also be in place.

V. Management Review

1. Top management need to conduct periodic documented reviews of the **P² Plan** to ensure that it is effectively addressing the organization's environmental issues.