

Recycling in Pennsylvania Office Buildings

Recycling at commercial, institutional, and municipal establishments throughout Pennsylvania can make a positive impact on our environment and our local communities. These establishments contribute about 50% of the municipal waste stream, so it is important that they be a part of our waste management program and work together with their community and local municipality to establish and maintain a successful recycling program.

Recycling is local in Pennsylvania - The Municipal Waste Planning, Recycling, and Waste Reduction Act of 1988 (Act 101) requires commercial, institutional, and municipal establishments located in Pennsylvania's mandated municipalities to recycle high-grade office paper, corrugated paper, aluminum, and leaf waste. In addition, establishments must recycle any other materials included in the municipality's recycling ordinance or regulations, which may include glass, newsprint, plastics, and/or steel and bimetallic cans. Businesses and institutions with facilities located within mandated municipalities must implement recycling programs according to local requirements, those not, are encouraged to recycle.

General municipal recycling requirements are as follows:

- All commercial, institutional, and municipal establishments must source separate the following materials:
 - High grade office paper;
 - Corrugated cardboard;
 - Aluminum cans;
 - o Leaf waste; and
 - Any other recyclables that may be designated by the municipality.
- These establishments must arrange for the collection and recycling of all designated materials.
- All commercial, institutional, and municipal entities must provide written documentation as to the type and weight of materials recycled annually. Reports are due to the municipality by January 31 of each year on a form provided by the municipality.

Specifics for Office Buildings

To establish a successful recycling program in your office or office building, you need to determine what kind of program will work in your facility. You should first analyze your options. For example, would a mixed paper program be preferable to a white paper/newspaper/cardboard program? Knowing your facility will help you to decide which program best suits your needs. Below are some recommendations to assist you.

It should be noted that if you manage office buildings with multiple tenants, you are responsible for providing tenants with an opportunity to recycle. Tenants must be informed of their responsibilities and your waste management system must accommodate recycling.

Facts About Office Paper

As much as 93% of all office waste is paper, most of it recyclable. As noted above, recycling of high grade office paper and corrugated cardboard is required in commercial establishments located in mandated municipalities in Pennsylvania.

- 77% of paper waste generated in offices is recyclable.
- Typical business offices generate about 1.5 pounds of waste paper per employee each day. Financial businesses generate more than two pounds per employee daily.
- Nearly half of typical office paper waste is high-grade office paper.
- It is possible to achieve significant reduction in the cost of buying office paper by reducing paper use and reusing paper where possible.
- Eliminating office paper from your waste may reduce your waste bill by as much as 50%.
- Recycling one ton of paper typically saves about 6.7 cubic yards of landfill space. A cubic yard of stacked office
 paper weighs about 380 pounds. Cost savings may be estimated by multiplying the tons recycled by 6.7 times
 the cost per cubic yard for waste disposal (if by volume) or by cost per ton (if by weight).

Commercial and residential paper waste accounts for more than 40% of waste being landfilled. Eliminating this paper from our waste would nearly double the lives of current landfills.

Steps for Successful Recycling in Offices and Office Buildings

Almost all types of paper used in the office can be recycled. It can be separated into various grades ranging from high to low. High-grade papers generally include but are not limited to white computer paper, bond, letterhead, and ledger. Lower grades may include mixed grades, file stock, ground wood papers, newsprint, and colored paper. Corrugated cardboard must also be recycled, but it is nearly always managed separately from all other paper.

Mixed paper is generally considered low grade even if it contains high-grade paper. Easily identifiable high-grade papers (such as computer printout) should be kept separate if possible, to take advantage of its higher market value.

While most of the recycling stream in offices will be paper, businesses and institutions in many municipalities may also have to recycle other items such as aluminum cans and plastic and glass bottles. These other recyclable materials must be considered when planning a program.

- Perform a waste assessment. Walk through your office or office building noting what type of waste is discarded in each area. A walk-through will help you determine which types of collection containers are needed. Typical programs are likely to involve some of the following:
 - Administrative and office areas office paper, corrugated cardboard, other paper, cans, bottles, toner cartridges.
 - **Food service areas** glass, metal, cans, plastic containers, corrugated cardboard (make sure that food waste is separated from recyclables).
 - Public areas newspaper, magazines, bottles, cans.
- 2. Based on the results of the waste assessment, set up appropriate recycling programs in each area.
- 3. Placement of containers in offices is critical, and space is often an issue. Containers should be close enough to where the waste is discarded so that it will be convenient for people to use, but not so widespread that they cause clutter. It is a good idea to discuss with employees who work in the office space where containers should be placed to facilitate their use.
- 4. Make sure that all containers are well-marked. For public areas, it is best to choose containers with specialized openings, such as a hole for cans or a slot for newspapers. It is also important to place containers where the materials are generated to make recycling convenient.
- 5. Inform employees about proper recycling procedures. Issue a memo, throw a kick-off party, and explain any separation procedures when you distribute containers. Make sure to follow up to ensure that procedures are being followed and further educate employees as necessary.
- 6. Set up a log book or a receipt system to record the volume of recyclables leaving the premises. This will enable you to receive proper compensation for your materials and to take appropriate action if volumes change.
- 7. Include recycling information in your orientation for new employees.
- 8. As you establish policies, explain the recycling program goals to your custodial staff for they will be very important to the success of your program and may provide you with key information helpful when finalizing your recycling policies. Train them by showing them what to do with new containers, how to collect waste separately, and where to take separated materials. For a 24-hour operation, plan pick-ups on appropriate shifts so that you do not have a problem with overflowing containers.
- 9. Ask for assistance from your custodial staff in monitoring the program. Have them inform you of areas with major contamination problems or where employees are not participating, and follow up with improved recycling education in these areas.
- 10. If appropriate, make sure that your grounds crew knows to keep yard waste separate from other waste.
- 11. Ask your waste hauler for advice about keeping recyclables and wet waste separate. Depending on the company's trucks and equipment, your hauler may want to give you separate containers for trash and recyclables.
- 12. Remind employees to keep food waste out of recycling containers and trash. Food waste should be handled separately from trash and recyclables.
- 13. Offices that have establishments in multiple locations need to coordinate their recycling efforts with each local municipality where they operate. Each municipality may have different recycling processes remember all recycling is local in Pennsylvania.

Offices, restaurants, schools, retail operations, manufacturers, hospitals, hotels, and other establishments each generate various types and amounts of wastes and have their own unique recycling opportunities. To learn more on how different types of establishments can implement a recycling program, please refer to our other Recycling Fact Sheets available at: http://www.depgreenport.state.pa.us/elibrary/ (select Publications and then Waste Management). Though each workplace may have differences in the waste they produce and what they can recycle, all have the capability of significantly reducing what and how much waste is disposed in our landfills. By recycling they can also save energy and reduce carbon emissions, save natural resources, and limit operational costs. It is important that we all work together with our employers and local municipalities to implement and maintain a recycling program at our places of work.

For more detailed information about recycling in Pennsylvania, visit the Pennsylvania Department of Environmental Protection, Bureau of Waste Management, Recycling in Pennsylvania website at: https://www.dep.pa.gov/Business/Land/Waste/Recycling.

