



How to Dispose of Unused Medicines

Household pharmaceuticals consist of a wide variety of items including over-the-counter drugs, prescription medications, controlled substances, and medications for pets. When these items are no longer used, residents often flush them down the toilet, store them in their medicine cabinets, or throw them out with the trash. These practices, however, can pollute the environment and create hazards. They can also lead to accidental poisoning, overdose, or illegal use by someone other than the intended person.

To avoid these problems, it is important to take precautions when storing and disposing these items. It is also recommended to use a drug “take-back” program that accepts household medications, empty pill bottles, vials, syringes, and other similar items. Further guidance for these programs is provided below.

Environmental Guidance for Kentucky

Kentucky’s Division of Compliance Assistance developed this fact sheet to help answer questions about household pharmaceutical waste disposal.

Households include single and multiple residences, hotels, motels, bunkhouses, ranger stations, crew quarters, campgrounds, picnic areas, and day-use recreation areas.

Note: Healthcare facilities are regulated under different standards. For more information, see the links provided on the back.

Recommended Disposal Option 1: Take Advantage of Drug Take-Back Programs

Drug take-back programs are the best way to dispose unused and expired medicines and should be the first option for households. There are generally three kinds of drug take-back programs: 1) collection boxes, 2) annual collection events, and 3) mail-back programs. Local government, law enforcement agencies, pharmacies, and hospitals often work together to provide these community-based programs. For more information about drug take-back programs in your area, contact your local government’s environmental, solid waste, or public health department.

1) Drug Take-Back Collection Boxes

Collection or drop-off boxes are available across Kentucky. These boxes are typically located at sheriff’s offices and other locations that can collect and dispose of drugs, including controlled substances. There are approximately 200 prescription drop-off boxes located throughout the state. To find a location near you, contact the Office of Drug Control Policy at 502-564-9564 or visit their webpage at: <https://odcp.ky.gov/Pages/Prescription-Drug-Disposal-Locations.aspx>.

2) Drug Take-Back Collection Events

Drug take-back events are temporary events set up for the public. They are scheduled periodically to provide safe disposal and to prevent abuse of unused prescription drugs. To find scheduled events, please visit: <https://takebackday.dea.gov/>.

3) Drug Mail-Back Programs

Mail-back programs offer a way to return unused medicines. Hospitals, clinics, pharmacies, manufacturers, narcotic treatment programs, and distributors may be authorized to collect these items and oversee mail-back programs. Visit: <https://apps2.deadiversion.usdoj.gov/pubdispsearch/spring/main?execution=e1s1> to find a mail-back program near you.

Recommended Disposal Option 2: Use Safe Disposal Methods at Home

Although drug take-back programs are the best option for unused medicines, there are cases where people have no access to these programs. When disposal at home is the only option, the Kentucky Department for Environmental Protection recommends the following precautions before placing unused medicines in the trash:

- ◆ Read and follow specific disposal instructions on the drug label.
- ◆ Remove or mark through any labels that identify the medicine or personal information.
- ◆ Remove drugs from original container and place in a plastic container such as a detergent bottle.
- ◆ Use a “do not recycle” label on any containers used for consolidating or disposing drugs.
- ◆ For solid medications: dissolve pills and mix with an undesirable substance such as cat litter or coffee grounds.
- ◆ For liquid medications: solidify by mixing 1-part liquid to 2 parts cat litter, dirt, or coffee grounds.
- ◆ Make sure the container with the mixture is sealed or secured with a lid and duct tape.
- ◆ Place the sealed container and any empty drug containers in the trash just prior to pick-up.
- ◆ Consumers may also use drug disposal products that are available at most retail pharmacies.
- ◆ **Never flush unused pharmaceuticals**, unless the instructions on the label recommend flushing as part of the Food and Drug Administration’s (FDA) risk policy. For more information, visit: <https://www.fda.gov/drugs/disposal-unused-medicines-what-you-should-know/drug-disposal-flush-potentially-dangerous-medicine#FlushList>.
- ◆ **Never burn unused pharmaceuticals** because of the potential for creating air pollutants.

Environmental Concerns

The properties that make pharmaceuticals useful are the same properties that can make them harmful to the environment. Likewise, their potency does not change when they are thrown away. That is why they must be managed in a way that prevents a release into the environment. One of the biggest concerns is the potential for pharmaceuticals to enter our waterways and contaminate our drinking water. In homes that use septic tanks, drugs that are flushed can leach into the ground. In homes connected to wastewater systems, drugs that are flushed can pass through the treatment process and enter rivers and lakes. By following recommended disposal practices and taking advantage of take-back programs, you can help provide simple, yet effective ways to keep the environment and your community safe.



Useful Links and Resources

- ◆ For information about managing pharmaceutical waste at healthcare facilities: <https://eec.ky.gov/Environmental-Protection/Compliance-Assistance/DCA%20Resource%20Document%20Library/PharmWasteBusinessEval.pdf>.
- ◆ For information about disposal of household sharps: <https://eec.ky.gov/Pages/Agency404.aspx?oldUrl=https%3a%2f%2feec.ky.gov%2fDCA+Resource+Document+Library%2fSharps+Disposal+Fact+Sheet+Update+042418.pdf>.
- ◆ For information and contacts regarding local services and community-based programs: <https://eec.ky.gov/Environmental-Protection/Waste/recycling-and-local-assistance/Documents/KY%20Solid%20Waste%20Management%20Planning%20Directory.pdf>.
- ◆ To find this fact sheet and other resources from the Division of Compliance Assistance: https://eec.ky.gov/Environmental-Protection/Compliance-Assistance/Pages/DCA_Library.aspx.

Disclaimer: The Division of Compliance Assistance helps small businesses, local governments, and the general public comply with state environmental regulations. This document is intended solely as guidance and is not a substitute for reading and understanding Kentucky’s statutes and regulations governing the applicability and issuance of environmental permits.



Kentucky Division of Compliance Assistance

Kentucky Energy and Environment Cabinet
300 Sower Boulevard, 1st Floor, Frankfort, KY 40601
Assistance Hotline: envhelp@ky.gov | 502-782-6189