

Identifying & Safely Managing Household Batteries



scdhec.gov/be-battery-smart

Every year in the United States, **millions of single-use and rechargeable batteries are bought and used, then recycled or thrown the trash.**

Batteries come in various chemistries, types, and sizes to fit different uses. Rechargeable batteries may be removable or permanently attached to devices.

DRAFT

BATTERY TYPE	USES AND DESCRIPTION
<p>Alkaline & Zinc-Carbon</p> 	<ul style="list-style-type: none"> • These everyday batteries can be used in products such as alarm clocks, calculators, flashlights, remote controls, radios, and children's toys. • For example, some common alkaline and zinc-carbon batteries include 9 Volt, AA, AAA, C, D, and some button cells.
<p>Button-Cell or Coin</p> 	<ul style="list-style-type: none"> • These small, round batteries have historically contained silver, cadmium, mercury, or other heavy metals as their main component. • Today, the majority are made of lithium metal. These batteries are used in products such as watches, hearing aids, car keyless entry remotes, medical devices, and calculators.
<p>Lithium Single-Use</p> 	<ul style="list-style-type: none"> • These common batteries are made with lithium (Li) metal and are single-use and non-rechargeable • They are used in products such as cameras, watches, remote controls, handheld games, and smoke detectors. • These batteries may be difficult to distinguish from common alkaline batteries, but may also have specialized shapes for specific equipment, such as some types of cameras, and calculators.

RECYCLING & DISPOSAL OPTIONS*

Management requirements are based on the battery's chemistry. They can be brought to specialized battery recyclers, participating retailers that provide battery take-back services, or local household hazardous waste collection programs. Contact the manufacturer or local solid waste authority for additional management options.

Button-cell or coin batteries can be a potential swallowing hazard. Store them out of the reach of young children.

In most communities, alkaline and zinc carbon batteries can be safely put in your household trash.




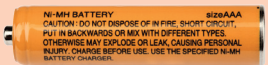


Handle batteries carefully. Place each battery or electronic device containing a Li-ion battery in a separate plastic bag or place non-conductive tape (e.g., electrical tape) over the battery's terminals or around the entire button. A lithium battery may spark and cause fires if damaged or the terminal ends touch. If the battery becomes damaged, contact the manufacturer for specific handling information.

Two resources for finding a recycler are the Earth911.com and Call2Recycle.org/locator.

Continued on the back

*SOURCE: EPA

Identifying & Safely Managing Household Batteries, Continued

BATTERY TYPE	USES AND DESCRIPTION
<p>Nickel Cadmium (Ni-Cd)</p> 	<ul style="list-style-type: none"> • These batteries are typically used in cordless power tools, cordless phones, cameras, two-way radios, and bio-medical equipment. • Ni-Cd batteries may look like single-use AA, AAA, or have other alkaline batteries or a battery pack shape for specific tools.
<p>Lithium-Ion (Li-ion)</p> 	<ul style="list-style-type: none"> • Commonly found in older cellphones, power tools, cameras, laptops, toys, e-cigarettes, appliances, tablets and e-readers. • Some Li-ion batteries are not easily removed and can become a fire hazard if they are broken, bent or crushed.
<p>Lithium Polymer (LiPo)</p> 	<ul style="list-style-type: none"> • A rechargeable battery of Li-ion technology using a polymer electrolyte instead of a liquid electrolyte. • LiPo batteries provide higher specific energy than other lithium battery types and are used where weight is a critical feature – such as in mobile devices.
<p>Nickel Metal Hydride (Ni-MH)</p> 	<ul style="list-style-type: none"> • Found in cellphones, cordless power tools, cameras, and two-way radios. • These batteries are no longer commonly used.
<p>Nickel-Zinc (Ni-Zn)</p> 	<ul style="list-style-type: none"> • Commonly found in cameras, wireless keyboards, and other small electronics.
<p>Small-Sealed Lead Acid (Pb)</p> 	<ul style="list-style-type: none"> • Commonly found in mobility scooters, children's toy cars, emergency lighting, and hospital equipment. Also used for backup power in residential landline phones and uninterruptable power supplies for computers.

