

# What happens to old batteries?

## Mobile Battery Service recycles ones it replaces

A breakthrough in recycling is under the hood of your vehicle. In the U.S., 99% of lead-acid automotive batteries are recycled, making them one of the most recycled products on the market.

Recycling an old battery reduces waste and removes a potential hazard from a landfill or your home. It's a win-win situation, as drivers and the environment benefit.

Each battery has nearly 21 pounds of lead and a quart of sulfuric acid. Using a special shredder, the plastic is chipped, washed and sent to a plastics plant, where it is melted and made into new battery cases or other parts.

The lead is melted and poured into ingots for use in new batteries. Sulfuric acid is neutralized and turned into water or converted into sodium sulfate that is used in laundry detergent and other products.

A new generation of electric vehicles will bring a significant increase in the number of batteries on the road and concerns about how those advanced lithium-ion batteries will be recycled after their 10 to 15 years of usage. Carmakers like Volkswagen, which plans to build 1 million electric vehicles yearly by 2025, already is working to develop a robust second life for the batteries that will power them.

Batteries eventually lose the ability to hold energy. A lead-acid battery's lifespan depends on a variety of factors, but only about 30% of batteries sold today will see their third birthday. Car batteries need to work in huge temperature extremes and stand up to constant shocks and vibrations. Multiple onboard computers, and powertrain features like stop-start technology, heated seats, wireless hotspots and video displays have created a new level of demand for electrical power.



**HOLDS A CHARGE** – AAA batteries have a three-year, free-replacement warranty. Image: AAA.

If your battery is failing you, AAA Mobile Battery Service has trained technicians who perform a free test of your car's battery, starting and charging systems. State-of-the-art diagnostic equipment will confirm whether your battery will hold a charge, or if the problem lies deeper in the electrical system. Best of all, the technicians come to you and the service is included with your AAA membership. If necessary, and with your approval, they will install a new high-quality AAA battery on the spot.

Designed to meet or exceed your vehicle's original equipment design and power specifications, AAA batteries offer 100% free-replacement warranty for the first three years. Battery-service vehicles carry batteries compatible with 90% of all cars,

SUVs and light trucks.

Every battery that AAA replaces is safely recycled at an EPA-certified facility to conserve natural resources and protect the environment. AAA Mobile Battery Service has recycled more than 4 million automotive batteries, containing 90 million pounds of lead and 12 million pounds of plastic, helping to make car batteries the most-recycled consumer product in America.

### FOR MORE INFORMATION

AAA Mobile Battery Service is available from 6 a.m. to 11 p.m. 7 days a week. To verify availability in your area, call our toll-free number: 1-800-222-4357 for a no-cost evaluation.

## Steps to take before picking car battery

Car batteries are not a "one-size-fits-all" part. Differences in vehicle needs and manufacturers make for an array of battery choices on the market. Here's how to pick the battery that best suits your vehicle:

**Physical size** – Car batteries are sized by group number. The group number dictates the length, width and height of the battery case. Your vehicle is designed to hold a specific battery group size. While a different size battery might physically fit in the space, the battery hold-down will likely not secure it correctly. The terminals also might be in the wrong place. An undersized battery might move around, damaging itself or the car, while an oversized battery might not allow the hood to close or even

cause a short if the terminal's stick is up too high. Stick with the battery size found in your owner's manual.

**Power capacity** – Physical battery size isn't the only important factor. A battery must also have enough cranking amps to start the car. The amount of power a battery can put out at zero-degree Fahrenheit is called the cold-cranking-amp (CCA) rating. Manufacturers design vehicles with a minimum CCA needed to start the car. While it is OK to use a battery with more CCA than stock, it is highly unadvisable to use a battery with less CCA than the car requires. When in doubt, consult your owner's manual.

**Construction** – Not all batteries are created the same and how a battery is put together plays an important part in its service life. For example,

AAA Premium batteries feature rugged construction such as reinforced posts, straps and welds to protect vital internal components. Heavy-duty optimized electrical pathways inside a AAA Premium battery deliver power efficiently for strong starts every time.

**Warranty** – Most batteries include some sort of warranty. When it comes to battery warranties, longer always is better. Each AAA Premium battery is backed by a limited warranty that includes a three-year, free-replacement warranty.

Now that you know the basics, you are ready to pick a new battery. AAA Premium batteries are available at local NAPA Auto Parts stores, as well as AAA Approved Auto Repair shops, NAPA AutoCare Centers and AAA Mobile Battery Service.

### AAA DIRECTORY

#### AAA MEMBER SERVICES

TripTiks, Maps, Address Change,  
AAA Plus  
800-441-5008  
membersvcntr@aaaec.com

**APPROVED AUTO REPAIR:** 216-606-6332  
aar@aaaec.com

**AUTO BUYING SERVICE:** 800-446-7433

**DRIVER IMPROVEMENT PROGRAMS:** 216-606-6121

#### EMERGENCY ROAD SERVICE:

Cuyahoga County: 216-606-6000, [ers@aaaec.com](mailto:ers@aaaec.com)  
Ashland, Ashtabula, Geauga, Huron, Lake, Lorain,  
Portage, Mahoning, Stark, Trumbull, and Tuscarawas:  
800-AAA-HELP

**INSURANCE AGENCY:** 216-606-6194, 800-343-4851  
[insuranceservices@aaaec.com](mailto:insuranceservices@aaaec.com)

**PUBLIC AFFAIRS:** 216-606-6701

**PUBLIC RELATIONS:** 412-365-7274

**TRAFFIC SAFETY PROGRAMS:** 412-365-7211

**TRAVEL AGENCY:** 800-354-8761

[www.AAA.com](http://www.AAA.com)

### Northeast Ohio AAA Offices

**ALLIANCE** ..... 330-823-9820  
TRAVEL AGENCY ..... 330-821-2323  
2322 South Union Ave., 44601

**ASHLAND** ..... 419-289-8133  
TRAVEL AGENCY ..... 419-289-2222  
1074 Commerce Parkway, 44805

**ASHTABULA** ..... 440-997-5586  
TRAVEL AGENCY ..... 440-998-1008  
2835 North Ridge Rd. East 44004

**AVON** ..... 440-695-1795  
35676 Detroit Rd. 44011

**BOARDMAN** ..... 330-726-9083  
TRAVEL AGENCY ..... 330-726-0622  
1275 Boardman-Canfield Rd., 44512

**INDEPENDENCE** ..... 216-606-6300  
TRAVEL AGENCY ..... 216-606-6080  
5700 Brecksville Rd. 44131

**LYNDHURST** ..... 440-473-0700  
TRAVEL AGENCY ..... 440-473-0747  
5356 Mayfield Rd. 44124

**MASSILLON** ..... 330-833-1084  
TRAVEL AGENCY ..... 330-833-1084  
1972 Wales Rd. 44646

**MENTOR** ..... 440-974-0990  
TRAVEL AGENCY ..... 440-205-9090  
6980 Heisley Rd., 44060

**NEW PHILADELPHIA**  
TRAVEL AGENCY ..... 330-343-4481  
1112 Fourth St., 44663. .... 330-343-4481

**NILES** ..... 330-652-6466  
TRAVEL AGENCY ..... 330-652-6466  
937 Youngstown-Warren Rd., 44446

**NORWALK** ..... 419-668-1622  
TRAVEL AGENCY ..... 419-668-1622  
275 Benedict Ave. Norwalk 44857

**OLON** ..... 440-248-9000  
TRAVEL AGENCY ..... 440-248-1808  
34050 Solon Rd. 44139

**STRONGSVILLE** ..... 440-783-3395  
TRAVEL AGENCY ..... 440-783-3396  
17220 Royalton Road, 44136

**WESTLAKE** ..... 440-788-3102  
TRAVEL AGENCY ..... 440-788-3103  
149 Market St., Crocker Park, 44145