

E-bikes are powered by lithium-ion batteries similar to the ones in your cellphone and laptop computer, only larger. If used or stored incorrectly, or used when damaged, lithium-ion batteries can present fire hazards. When basic safety guidelines are followed, however, lithium-ion batteries are safe. Here are some best practices you can follow to protect yourself and others.

#### **KNOW BEFORE YOU BUY**

- **NOTE:** All e-bikes purchased through the Boston E-Bikes Incentive Program must be UL certified.
- If you are purchasing a backup or replacement battery for your bike, avoid off-brand batteries. Purchase from your original e-bike manufacturer if possible, and only use batteries that have the same specifications as the original.

# SAFE CHARGING BASICS

- Always use the original charger that came with your e-bike. If you need a backup or replacement charger, purchase one with the appropriate specifications from the manufacturer.
- Never leave your battery unattended while charging.
- Unless otherwise specified by your bike's manufacturer, plug the charger into the wall first, then into the battery.

- It is best to charge your e-bike battery indoors. Do not charge with the battery or charger in direct sunlight or extreme temperatures (hot or cold).
- Do not leave your battery plugged in at all times. Be sure to unplug your battery once charged.
- Plug your e-bike charger directly into the wall. Do not use extension cords or power strips.
- If your battery is damaged, do not charge it or use it.



#### PROPER BATTERY CARE

Good battery care and storage habits will help extend your battery's lifespan.

- If your battery is external, remove it from the bike before transporting the bike to avoid damage.
- Always follow your e-bike manufacturer's charging and storage guidelines.
- Do not modify your e-bike battery in any way.
- Avoid charging or storing your battery in extreme temperatures (hot or cold).
- For long term storage keep your battery between 30–70% of its charge. Do not store your battery when it is fully depleted.
- If your battery is damaged, bulging, or overheating, do not use or store it.

# SAFE RECYCLING AND DISPOSAL

- Participating bike shops in the Boston E-Bikes Incentive Program must recycle any battery sold through the program.
- To dispose of a damaged e-bike battery, call your local fire department and ask for assistance.
- To dispose of an e-bike battery at the end of its life, you will need to make sure to properly recycle it.



### **ADDITIONAL RESOURCES**

Call2Recycle also offers free battery recycling for participating brands. You can search for drop off locations and learn more here: <a href="https://www.hungryforbatteries.org/">https://www.hungryforbatteries.org/</a>

https://www.boston.gov/boston-bikes

