What Components do I need for RailBoss 4 R/C Battery Power?

Batteries and Charger

You need on-board batteries to supply the power, and an external battery charger to recharge them. We recommend Lithium-Ion battery packs from **Power.Tenergy.com**, but you may also use Ni-Mh, Ni-Cad, drill batteries, etc. The maximum voltage input for our controls is 25VDC (with a full battery charge, actual voltage will be greater than rated). Voltage determines max speed. Mah (Milli Amp Hours) determines run time.

www.Power.Tenergy.com/battery-packs

Lithium-Ion batteries and chargers (our preferred supplier)

Power Input

You will need a few components for the power input circuit. We can supply you with individual components for the battery on/off switch and charging jack, but we highly recommend our Battery Conversion Module (BCM) which greatly simplifies installation by connecting the power on/off switch, charging jack, fuse, power LED, and extra output terminals on a small circuit board. You will also need our charging plug with wires to adapt your battery charger to the BCM charging jack. A battery connector pair between the battery pack and BCM is also recommended to safely disconnect the battery when needed. We also offer 2-wire or 4-wire cables to go between loco and tender, or loco and trail car.

BCM – Floor Mount for Tender. The power on/off switch is floor mounted (under tender), or on the end bulkhead, with a remote charging jack mounted anywhere.

BCM – Door Mount for Trail Car. The BCM with power on/off switch and charging jack is accessed via a box car door or removal of a roof.

BCM – Floor Mount for Diesels. The power on/off switch is mounted on a bulkhead, with a remote charging jack mounted anywhere.

Control System

The control board provides the motor driver, a micro-controller, and interface circuitry for lights, sound, reed switches, and radio control.

RailBoss 4 R/C Control Boards (Receivers) have a few options to choose from ...

The **Basic** provides speed control functions and four sound trigger outputs for use with sound cards, such as MyLocoSound or Phoenix Sound.

The Plus adds automated station stops, low battery warning, and much more (see manual or webpage).

5 or 10 amp? Most locos will only need 2 to 3 amps, so 5 amps is the norm. Select the 10 amp if running more than one loco from the only one RailBoss 4, i.e. AB, or ABA diesels, or any loco using more than 4 amps under normal running conditions.

A Mounting Plate makes installation easier. It provides a nice flat bottom surface to use double sided tape on.

RailBoss 4 Transmitters (Remotes) have two cases to choose from. Both have the same radio and range. Both fit nicely in your hand.

Standard Case has a contoured case with waterproof recessed buttons and uses two AAAA batteries.

3D Printed Case has raised buttons and uses two AAA batteries. It is a lower cost option.

You may also need additional connectors to route power and signals between trailing cars/tenders/locos. We have 2-wire and 4-wire locking connector cables. (2 wires for motor, another 2 for front light). Reed switch and track magnets are used for automated station stops and triggering bell and horn/whistle of sound card. Use two reed switches; bell/station stops on the left side of track, whistle on the right.

MyLocoSound Sound Card

Diesel, Light Diesel, Steam, Railcar/Goose, Electric, Tram/Street Car

Track or Battery Power. Select Battery Power. MyLocoSound will be powered from your large Tenergy battery.

The **MyLocoSound IR Remote** to configure various sound options, and control volumes. Only one remote is needed for multiple sound cards.

We also have Speakers, reed switches and track magnets, chuff magnets, and mounting plates.

Installation

Sorry. We don't do installations. Most of our customers successfully install our systems themselves. If this isn't for you, you may want to get help from a club member or find a local installer to avoid having to ship your locomotive.