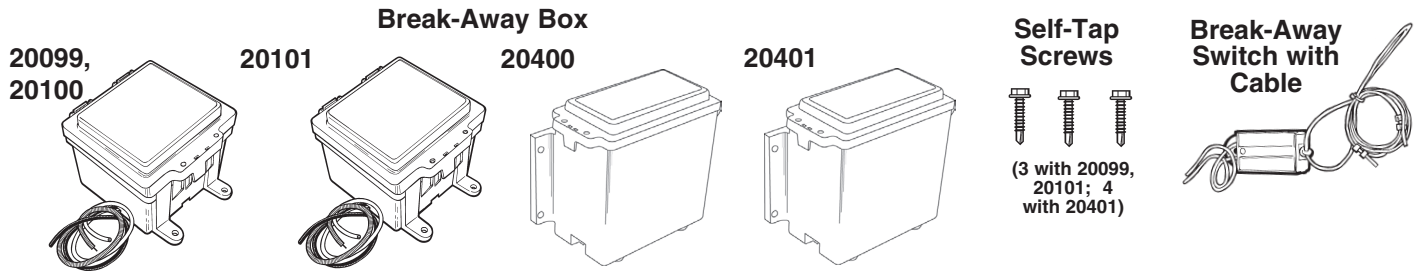




**PART #20099, #20100, #20101 #20400, #20401**  
**Break-Away System** for Single and Tandem Trailers

**Make sure you have all parts before you start your installation.**



The Engager™ Break-Away System is designed to bring trailers safely to a stop by activating electric brakes, should a trailer be disconnected while driving. This type of safety system is required in most states on trailers rated over 3,000 Lb. GVW. The following instructions must be precisely followed to ensure proper operations. Please read the following instructions thoroughly before installing this product. Your trailer must have operational electric brakes before installation, and your auxiliary power wire on the tow vehicle must be connected. Once you determine your trailer brakes work, and you verify that your auxiliary power is connected, find a secure location on your trailer to mount the Break-Away Kit.

**★ UNIT MUST BE FULLY CHARGED BEFORE USE ★**

- For Models 20099, 20100 and 20400: **If the red light illuminates when the test button is pushed, the battery charge is low. Connect the trailer plug to the tow vehicle so the Break-Away Kit can charge from the vehicle's battery (This can only be done after kit is installed on trailer). The amber light will illuminate indicating the battery is charging.** The battery should re-charge in about twenty minutes.
- For Models 20101 and 20401: Check battery charge with a battery tester. If charge is low, follow same instructions as for 20099, 20100 and 20400. (This kit also has a built-in charger).

**MOUNTING INSTRUCTIONS:**

1. Locate secure surface on trailer to mount Break-Away Kit.
2. Route screws through provided holes in the Break-Away Kit plastic casing. Use wrench and drill to secure to trailer.
3. Next, mount Break-Away Switch close enough on trailer that cable can be attached to vehicle.
4. Follow "Wiring Instructions".

**WIRING INSTRUCTIONS:**

1. Splice the black wire of the Break-Away Switch to the electric brake wire coming from the trailer side connector (A - see diagram on next page).
2. Connect blue wire of Break-Away Switch to the blue wire (labeled "Brake") from the Break-Away box (B).
3. Splice white wire from Break-Away box to existing ground wire on trailer or ground directly to trailer frame (C).
4. Splice black wire on Break-Away box to trailer 12-Volt auxiliary power lead (D). This will charge the Break-Away battery when vehicle is in use.
5. Test unit by pulling firmly on cable of Break-Away Switch. Battery will activate brakes. (Note: Do not use this kit as a parking brake.) Battery should be charged and tested prior to each trailer outing.

**OPERATING INSTRUCTIONS:**

1. Test your Break-Away Kit before each outing as described in Step 5 of the wiring instructions.
2. Once tested, Break-Away Switch cable should be secured to vehicle bumper or frame. The cable can be attached many different ways. Two of the most common are: (1) Pull the pin out of the Break-Away Switch (Fig. 1) and route through safety chain pocket (Fig. 2), then through cable loop and reconnect pin. (2) Attach cable loop to a bumper clevis (Fig. 3). Do not loop cable over hitch ball, cable may bounce off while vehicle is moving. Note: Plunger pin must be facing the rear of the vehicle directly behind where you secure the cable on your vehicle. Any other angle may cause Break-Away Switch failure.

**ADDITIONAL INFORMATION FOR MODEL NUMBERS 20099, 20100 and 20400**

- The trailer plug should be detached from the towing vehicle when using the push to test feature to test the Break-Away battery voltage level. Otherwise you will be testing the towing vehicle's battery.
- If the trailer is plugged into a tow vehicle, the yellow "Charging" light will always be on.
- The LED assembly will only work with 12-volt batteries. The lower the battery voltage goes, the dimmer the LEDs will illuminate.

**Break-Away Kit accessories and replacement parts**

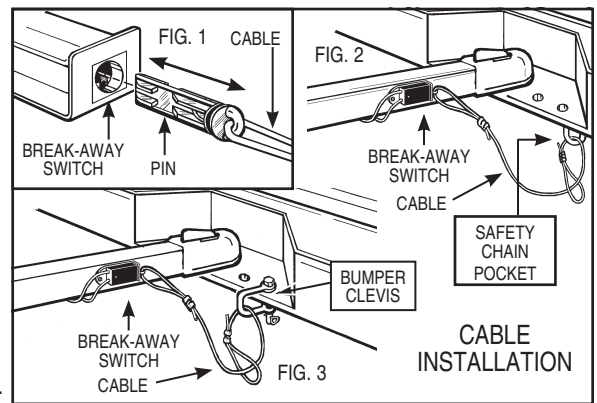
- #20005 Break-Away Switch complete with cable (7" wires)
- #20014 Break-Away Switch complete with cable (44" wires)
- #20007 Break-Away Kit Charger (20101, 20102, and 20401 only)
- #20009 Replacement Break-Away Switch cable and pin

**20099, 20100, and 20101 accessories**

- #20105 Plain lid
- #20106 Lid with meter assembly (20101 can be upgraded to this lid)
- #20107 Metal mounting plate

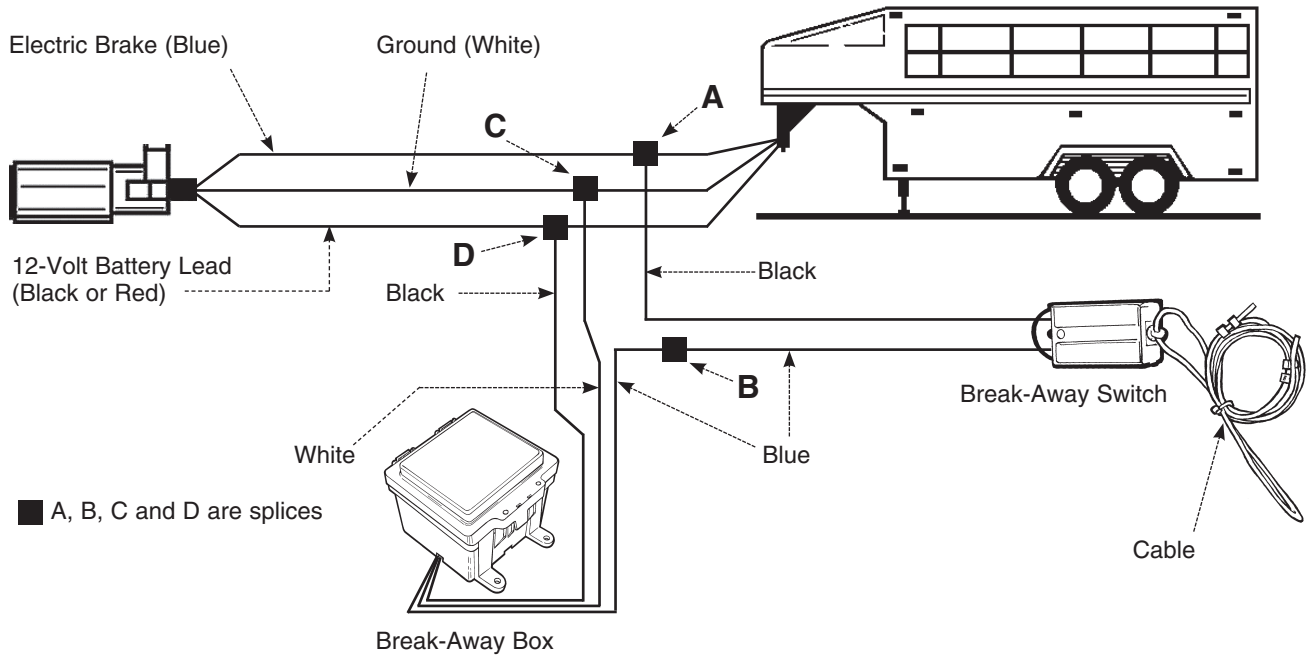
**20400 and 20401 accessories**

- #20405 Plain lid
- #20406 Lid with meter assembly (20401 can be upgraded to this lid)
- #20407 Metal mounting plate



**★ YOUR TRAILER MUST HAVE OPERATIONAL ELECTRICAL BRAKES AND YOUR AUXILIARY POWER WIRE ON THE TOW VEHICLE MUST BE CONNECTED TO USE THIS PRODUCT. ★**

# DIAGRAM WITH CHARGER



**Note:** Wire By Function Only. Color Coding is Not Standard Among Manufacturers.