

# Rear Vision System – Aftermarket and Factory Display Radio (Factory Display requires Chrysler/Dodge dealer to activate) 2009 – 2012 Dodge Ram (Kit part number 1009-6504)

Please read thoroughly before starting installation and check that kit contents are complete.

## Items Included in the Kit:

- Chassis Harness with RCA\*\* Tailgate Handle with Camera 8.4" Factory Touch Screen Jumper Harness
- 1 bag containing: Plug for Non-Locking Tailgates (Optional) White 22 pin connector (Optional)
- 1 bag containing: These instructions Template
- \*\*In some cases a RCA extension may be required to connect to your aftermarket display; Kit# 9002-6111 may be purchased from Brandmotion.com

## **Tools Required:**

Socket Wrench with 7mm & 8mm Sockets T20 and T30 Torx Bits Phillips and Flat Blade Screwdrivers Power Drill 1/8" Drill Bit 1" Hole Cutter Pushpin Removal Tool Round File or Deburring Tool Center Punch Utility Knife or Side Cutters Masking Tape Corrosion Inhibitor (recommended) Soldering Iron & Solder (recommended) Wire Ties (recommended)

We strive to provide accurate and up-to-date installation instructions. For the latest full color instructions, please visit www.brandmotion.com

## **Install Tailgate Handle Camera**

- 1. Set up a work area on which to set the tailgate after removal. This area should be well protected to avoid damage to tailgate.
- 2. Unhook both tailgate support straps by inserting a Flat Blade Screwdriver between the locking tab and strap mount. Lift the locking tab away from the strap mount with the screwdriver while sliding the tailgate strap upwards. The tailgate strap hanger can now be removed from the mount.



3. Open tailgate about ten degrees and lift right side of the tailgate off the pin. Next, slide tailgate to the right to remove taking care not to damage the paint. NOTE: Tailgate removal and installation requires two people. 4. Remove the handle access panel inside the tailgate using a T30 Torx driver. (NOTE: If vehicle is equipped with a bed liner, the tailgate portion of the liner must be removed prior to this step.)



 Remove nuts attaching handle to tailgate using an 8mm Socket, then remove handle from tailgate. (NOTE: Non-power locking tailgate mechanism shown.)

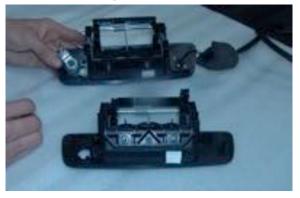




6. If equipped, remove the lock cylinder from existing handle.



7. If equipped, remount the lock cylinder in the supplied Tailgate Camera Handle using an 8mm Socket and existing hardware.



8. Use a Utility Knife or Side Cutters to remove the Rubber grommet closest to the gray connector end from the Camera Harness. Wrap the Camera Harness with Electrical Tape where you removed the grommet.



# INSTALLATION INSTRUCTIONS

9. Use Masking Tape to affix supplied Template A to tailgate. An existing small rectangular hole in the center of the lower tailgate edge will match up with the left side of Template A. Use a Center Punch to mark the tailgate at the "X" on Template A and remove Template A.



10. Use a 1/8" drill bit to make a pilot hole at the center punch mark. Then use a 1" Hole Cutter to cut a pass through in the tailgate.



11. Clean rough edges of the hole using a Deburring Tool or Round File. RECOMMENDED: Apply Corrosion Inhibitor to the metal edges.





12. Route the gray Camera Harness connector and wiring through tailgate and install supplied handle using an 8mm Socket with the existing hardware.



- 13. Reinstall handle bolts.
- 14. Route the supplied Camera Harness through the pass-through hole in the inner brace of the tailgate.



- 15. Seat Camera Harness grommet in the pass through hole you drilled in the tailgate using your fingers
- 16. Taking care not to damage the Camera Harness, reinstall tailgate by lifting it into place, rotating it down about ten degrees, and sliding it to the left.
- 17. Reinstall both tailgate straps by placing the large opening of the tailgate strap hangers over the tailgate strap mounts and pulling down.
- 18. Feed the gray end of the Camera Harness through the rectangular opening at the rear of the truck bed.



### **Install Chassis Harness**

19. Remove front driver's side kick panel/sill plate by lifting it at the rear and working your way forward with your hands.



20. Remove rear driver's-side sill plate by lifting it at front and working your way back with your hands.



21. Lift driver's side rear seat to expose the under seat storage compartment. Pull three pushpins out of the driver's side rear seat storage compartment using a Pushpin Removal Tool.



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22. Pull back carpeting and remove the body floor plug.



23. Insert the large gray connector end of the supplied Chassis Harness through the body floor plug hole.



24. Seat grommet affixed to the supplied Chassis Harness in the body floor plug hole by firmly pressing it with your fingers.



25. Route the Chassis Harness RCA connector through the seat riser reinforcement hole.



- 26. Reinstall carpet and reinstall the three pushpins removed earlier.
- 27. Route Chassis Harness around B-pillar trim by lifting up on the trim and feeding harness through to front.



28. Continue to route Chassis Harness along the driver's side front door opening sill area. NOTE: This will be a tight fit, as the supplied Chassis Harness will follow the existing wiring harness.



- 29. Reinstall rear sill plate by pressing it back into place with your hands.
- 30. Remove driver's side kick panel insulation pad retainers using a Pushpin Removal Tool. Route the supplied Chassis Harness behind the insulation (between insulation and metal frame) then reinstall the insulation).



- 31. Reinstall front kick panel/sill plate by pressing it back into place with your hands.
- 32. If needed, install aftermarket display/ Navigation display per manufacturer's instructions.

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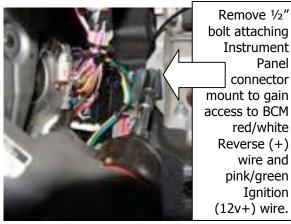


#### **Connect Chassis Harness to Vehicle Wiring**

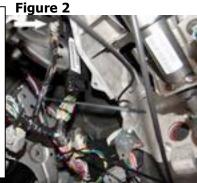
33. Connect the supplied Chassis Harness Red, Green, and Black leads as directed in the chart appropriate for your vehicle below.

Chart A: Aftermarket display / Factory NAV			
Color	Polarity	Function	Location
Green	(+)	Reverse	Splice to white/red wire in Instrument Panel connector pin 7 (Figure 1)
Red	(+)	Ignition	Splice to pink/green wire in Instrument Panel connector pin 16 (Figure 1)
Black	(-)	Ground	Chassis ground (Figure 2)





Remove bolt to attach eyelet on Black Ground wire from supplied Chassis Harness to Chassis Ground bolt.



34. If using this kit with the factory 8.4" touch screen, follow Steps 35 through 49 and Steps 52 through 54 below.

If using this kit with an aftermarket mirror / display / NAV display, connect Chassis Harness male RCA to "Camera IN" on the

## INSTALLATION INSTRUCTIONS

#### aftermarket mirror / display/ NAV display. NOTE: A RCA extension may be required. Proceed to Step 46.

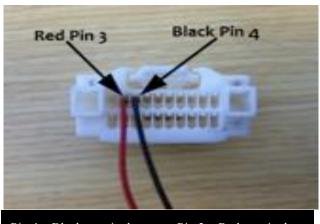
35. Connect supplied 8.4" Touch Screen Jumper Harness to RCA end of supplied Chassis Harness.



- 36. Use of this camera with the factory Ram 8.4" touch screen requires activation by a Chrysler/Dodge dealer. See below for Dealer Programming Instructions. If possible, have the dealer "enable" the camera option prior to installation.
- 37. Use a Plastic Trim Tool to remove shifter bezel and remove two screws from under the rubber mat using a Phillips screwdriver.
- 38. Use a Plastic Trim Tool to remove cup holder bezel.
- 39. Remove rubber mat on top of 8.4" screen to expose two screws and remove them using a T20 Torx bit.
- 40. Remove rubber mat in square cubby hole to expose one screw and remove it using a T20 Torx bit.
- 41. Use a Plastic Trim tool to remove radio bezel to expose the 4 screws securing the radio head unit and remove them using a 7mm socket.
- 42. Unplug all radio connectors from the radio head unit and set radio aside.

Note: If vehicle is NOT equipped with a 22-pin radio connector (Figure 3), use supplied white connector to complete steps 43 and 44.





Pin 4 – Black terminal

Pin 3 – Red terminal



IMPORTANT: If the white 22-pin connector is present in the vehicle and pin 3 and/or pin 4 are already populated, remove the terminal(s) using Delphi terminal removal tool# 12094429 or a small flat watch repair screwdriver and isolate with electrical tape.

- 43. Locate pin position 3 on the white 22-pin radio connector (Figure 3) and insert red terminal of the jumper harness until it clicks securely.
- 44. Insert black terminal of the jumper harness into pin position on the white 22-pin radio connector (Figure 3) until it clicks securely.
- 45. Connect white 22-pin connector to radio along with all remaining connectors before reinstalling radio head unite and all trim removed.
- 46. Route Chassis Harness behind rear cab mount and out to the inside of the vehicle. RECOMMENDED: Use a Wire Tie to secure Chassis Harness between the cab and bed mount.



- 47. Continue to route supplied Chassis Harness next to the existing wiring harness along the inside edge of the frame rail. RECOMMENDED: Secure supplied Chassis Harness to the existing wiring harness with Wire Ties.
- 48. Once the Chassis Harness has been routed to the rear of the truck bed, coil and secure any excess length on the harness and tuck above the spare tire. Secure with Wire Ties (recommended) or Electrical Tape.
- 49. Plug Camera Harness connector into the Chassis Harness connector at the rear of the vehicle.
- 50. Start vehicle and shift into Reverse in order to check that all connections were made properly. If all of the connections are correct you will see the camera image displayed on your aftermarket mirror / display/ NAV display.
- 51. Reassemble all previously removed parts.

## **INSTALLATION INSTRUCTIONS**

52. If you connected the camera to a factory 8.4" touch screen, and the vehicle has not been reprogrammed to "enable" the camera, have a Chrysler/Dodge dealer program the vehicle as follows:

#### Dealer Programming Instructions PARK VIEW REAR BACK-UP CAMERA VEHICLE CONFIGURATION

Vehicle VIN must be updated with the sales code of the added accessory in order to enable system functionality. Using the DealerCONNECT website and the scan tool, complete the procedure below:

- A. Log on to https://dealerconnect.chrysler.com.
- B. In the "Vehicle Option" screen under "Global Claims System" category in the "Service" tab, enter the VIN and add the following sales code: XAC (PARK VIEW REAR BACK-UP CAMERA) as a "Dealer Installed Option."
- C. Confirm that the new sales code has been successfully added to the VIN. With the scan tool connected to both the internet (via Ethernet port or wireless connection) and the vehicle, follow the steps below:
- D. Using the scan tool select the VEHICLE PREPARATION and then select RESTORE VEHICLE CONFIGURATION.
- E. Follow the step by step instructions on the scan tool to complete the Park View Rear Back-Up Camera vehicle configuration.
- 53. Start vehicle and shift into Reverse in order to check that all connections were made properly. If all of the connections are correct you will see the camera image displayed on your factory screen.
- 54. Reassemble all previously removed parts.