



INSTALLATION INSTRUCTIONS

Thank you for purchasing genuine Design Engineering, Inc. products. Be sure to always wear the proper safety equipment when installing any DEI product. Design Engineering Inc. WILL NOT BE HELD LIABLE FOR IMPROPER INSTALLATION OR USE OF THIS PRODUCT. Please follow all instructions provided. If you are unsure of any installation procedure, please contact a certified technician.

DESCRIPTION: Sprinter Van Insulation Kit

KIT CONTENTS:

- 250sqft or 350sqft of Boom Mat D-Mat insulation depending on part number.
- One can of Boom Mat spray adhesive
- One roll of Boom Mat Damping Tape
- Ten 6" x 12" pieces of Boom Mat damping material (050401) or Eight for (050400)
- Fishing Wire
- Instructions

TOOLS NEEDED:

Scissors, Tape Measure, Marker, Panel tool or flat blade screw driver, Utility knife, Needle Nose pliers, 25 Torx driver

SAFETY:

Safety glasses
Gloves

NOTE OF CAUTION: Wear eye and hand protection when installing all materials. Use spray adhesive in a well ventilated area.

OVERVIEW: Sprinter Van Insulation Kit is designed to insulate the interior of the van and reduce unwanted noise.



Fig 1

STEP 1. Depending on your van's options you may or may not have to remove side panels or roof panels.

STEP 2. To remove side panels use your torx bit to remove all the screws and hardware from each panel. On doors you will need to use the panel tool and carefully pop the clips holding each panel on.

STEP 3. Once the panels are removed set them outside the van for reinstallation later.

STEP 4. The roof panels are removed starting at the rear of the van. The fasteners used on the roof are two piece push in type. Using the panel tool or screw driver carefully pull the center pin down while leaving the plug in the panel. Once the pin is removed the plug will come out. Remove all the fasteners at the rear of the roof panel. **Fig 1**

STEP 5. Pull the rear panel down and slide it backwards and out from under the next panel. Each additional panel is held in by clips above the rear portion. Using the panel tool pop each clip out. If the panel has a light be sure to unplug the light before removing panel.

STEP 6. Work your way to the front removing each roof panel.



Fig 2

STEP 7. Now that the van has all the panels removed you can see all the areas that need insulation and dampening material. The van has limited dampening material installed from the factory, we will be adding more material as we go. **Fig 2**

STEP 8. Find the 6" x 12" pieces of Boom Mat damping material. Cut each piece into 6" x 6" squares. In the center of each cargo bay panel, **Fig 3** install one piece making sure the area is clean before installing. Press the 6" squares firmly to ensure good adhesion. **Fig 4 (Areas marked in red. Install on both driver and passenger sides)**



Fig 3

STEP 9. Apply the remaining damping material in any flat areas of metal throughout the van interior. You do not need full coverage of damping material in these areas.

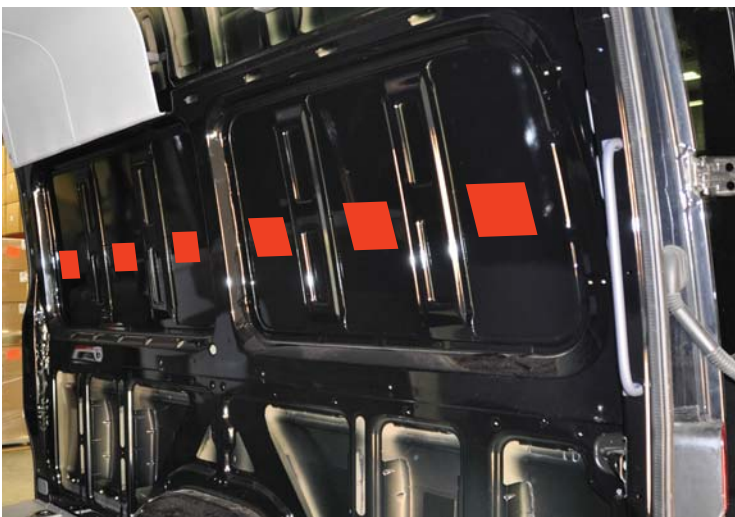


Fig 4



NOTE: Use damping tape for small areas. Cut in strips to add to other roof panels

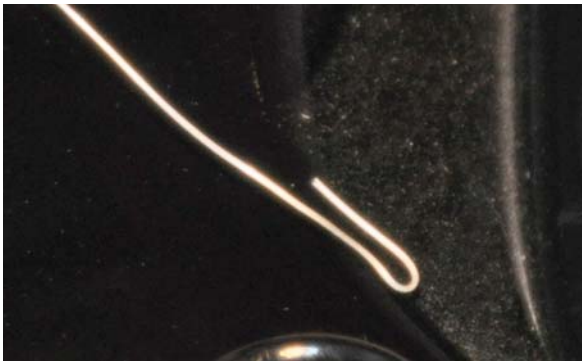


Fig 5

STEP 10. Find the fishing wire included with your kit. See **Fig 5 & Fig 6** to see how to route the wire. The wire will be used to pull the D-Mat insulation into cavities of your Van.

STEP 11. For the roof beams, fold each end of the wire over creating an oval loop in each end.

Fig 5

From the center hole in the beam feed the wire to one end and pull down through the large hole. Now feed the opposite through the same center hole to the other side, pull the wire down until it goes up in the center hole and is fully in the beam. If you try to feed the wire from just one end it will get caught in the beams adhesive making it difficult to feed all the way through.

Fig 6



Fig 6

STEP 12. Measure the beam and cut your insulation to fit. Fold over one end of the insulation about two inches and cut a small slit. This will be the hole you attach to the pull wire. Insert the wire through the hole and start to feed it back into the hole in the beam while gently pulling on the opposite end of the wire. Pull and feed the insulation into the beam until you have pulled it through and remove the wire. Tuck in any remaining insulation and repeat for all the beams.

Fig 7

STEP 13. The same process is used for the other cavities shown and other places.



Fig7



Fig 7

STEP 14. Start to measure the openings needing insulation. You can measure and mark the D-Mat or you can make simple paper patterns to use. Remember that some cavities are larger than the opening. Be sure to take this into consideration when cutting to size. Test fit each piece before using the Boom mat spray adhesive to attach. **Fig 7**

STEP 15. Install insulation in all the openings and areas you like. You can cut and stuff small pieces into most any area. **Fig 8**

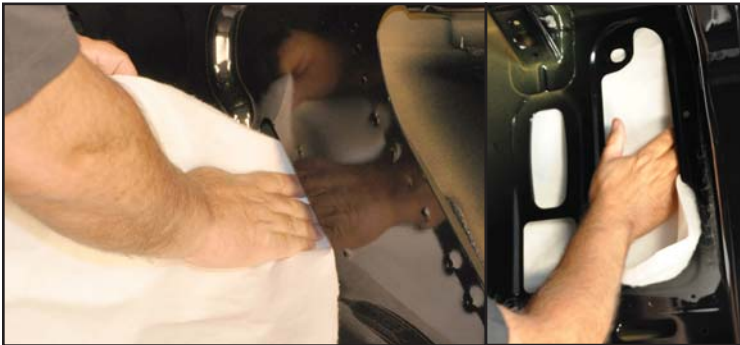


Fig 8

STEP 16. Reinstall the roof and side panels and door panels in reverse order of removal.

USING THE ADHESIVE SPRAY

The adhesive spray is a tack type adhesive. Both surfaces that are to be mated should be sprayed, left to tack for 30 to 45 seconds, then adhered together.

