



## 1. Purpose / Scope

- 1.1. This work instruction defines the methods, materials and processes used to install TrackPoint Systems (TPS) Trailer Inventory Protection System (Tr/IPs™) Load Sensor (LS) into a dry van trailer.

## 2. Responsibility

- 2.1. The customer is responsible for following this instruction during the installation of the referenced product. TPS manufacturing/ process engineering is responsible for generating and maintaining this instruction.

### NOTE:

Failure to follow this instruction will void the product warranty.

- 2.2. Following the installation conditions and procedures, in the order indicated in this instruction, is necessary to ensure the Tr/IPs™ Load Sensor (LS) creates a secure bond to the ceiling of the trailer.

### CAUTION!

This Procedure shall be used for installations on Fiberglass, composites and aluminum trailers.

- 2.2.1. This Procedure shall be used for installations on Fiberglass or other types of composite roof trailers or Refrigerated trailers.
- 2.2.2. Failure to follow this installation instruction could result in the Tr/IPs™ Master Control Unit separating from the vehicle resulting in possible injury or worse! Call TPS Customer Service before making any deviations from this Installation Procedure.

TPS Customer Service  
615-469-5152  
[info@Trackpointsystems.com](mailto:info@Trackpointsystems.com)

- 2.2.3. Contact TPS prior to any deviations from the installation of the Tr/IPs™ Master Control Unit described in this instruction. **TPS will not be responsible for any loss or damage caused by improper installation.**

### 3. Reference Documents

3.1. WI 158-3377 Tr/IPs™ Website Application Instructions

### 4. MATERIALS

- 4.1. Medium Duty abrasive pad (3M Scotch-Brite Pad #9650 or equivalent)
- 4.2. Clean, lint-free towels or paper towels
- 4.3. 50% to 70% Isopropyl Alcohol and water solution - (3M Prep-Solvent 70 or equivalent)
- 4.4. Substrate Primer (3-M #94 or equivalent)

### 5. TOOLS

- 5.1. 6' step ladder
- 5.2. 3/4 to 1" wide soft bristle brush
- 5.3. 1" wide Masking Tape (or equivalent)
- 5.4. Optional - 1.0" dia. x 2.0" min. wide hard rubber roller

**CAUTION!**

**DO** all installations in a dry environment. Trailer temperature shall be maintained above (60°F) for a minimum of 30 minutes before and after installation!

**DO NOT** install the Tr/IPs™ MCU in wet conditions, e.g. rain, fog, snow, ice, condensation, etc. evident on the trailer roof.

### 6. INSTRUCTIONS

6.1. The LS shall be orientated on the trailer ceiling as shown in Figure 1:

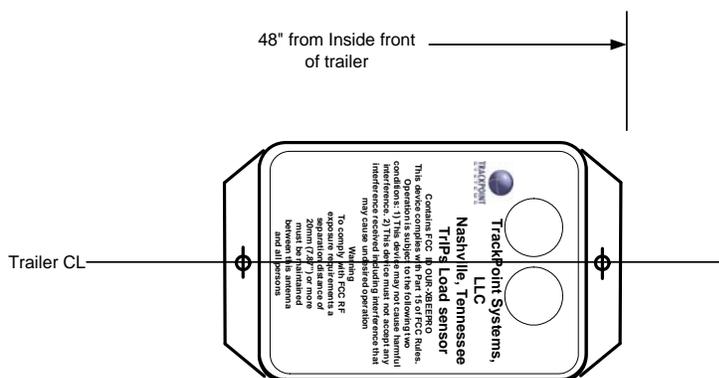


Figure 1

6.2. The recommended mounting location is 48" from the nose of the trailer just in front of the rib supporting the roof on the ceiling of a dry van trailer and on the front to rear centerline as indicated below. This location allows the ultrasonic cone to expand to roughly an 8' diameter foot print at floor level while protecting the LS from being damaged by forklift operation.

### 6.3. Surface Preparation:

6.3.1. Select the location for mounting and (optional) outline the area with masking tape. The dimensions of the mounting area are 5.5" x 3.5".

6.3.2. Clean the area where the tape (see Figure 2) will be applied using the 50-50 IPA and water solution and a clean lint free towel. Ensure any dirt, film, oil, wax, or other contaminants are removed from the mounting area, allow the surface to dry thoroughly before abrading the surface.

6.3.3. Abrade the cleaned area with the Scotch-Brite pad where the Tr/IPs LS will make contact with the roof.

6.3.4. Again clean the abraded surface with the IPA cleaning solution and a clean towel. Repeat this step with a new clean towel until the clean towel shows no sign of any remaining contamination.

6.3.5. Thoroughly wipe the surface dry with another clean towel.

6.3.6. Apply the 3M Primer 94 (supplied either in a "snap stick" or a 4 oz can) to the cleaned and abraded TrIPs mounting surface using a clean soft bristle brush. Allow the primer at least 5 minutes to dry completely.

### 6.4. Device Installation:

6.4.1. Remove the plastic film from the remaining VHB™ tape to expose the tape adhesive surface. **DO NOT** touch the exposed adhesive surface or primed surface. Any contamination will degrade the VHB™ bond strength. Carefully place the Tr/IPs™ LS on the roof within the boundaries of the masked area.

6.4.2. Firmly press the LS module all along the VHB mounting areas back and forth several times. **DO NOT PRESS ON THE ULTRASONIC TRANSDUCERS.**

6.4.3. Remove and discard the masking tape.

- 6.4.4. Visually verify a bond has been established between the LS baseplate and the roof.
- 6.4.5. Allow 15 minutes for the adhesive to set before testing the bond.
- 6.4.6. Verify the bond by firmly but gently pulling on the Tr/IPs™ LS to confirm a secure bond to the roof before releasing the trailer into service.
- 6.4.7. On the right side of the LS sensor is a slide switch. Slide the switch to the “ON” position and step toward the rear of the trailer. You will hear 10 single beeps followed by five double beeps. This is the sensor calibrating itself to the floor of the trailer. If this is successful, you will hear no further beeps from the sensor. If you hear repeated single beeps, you should repeat this step.
- 6.4.8. This sensor is paired with the MCU at the factory and will not communicate in error with any other MCU's in your fleet.

## 7. DEVICE REGISTRATION

- 7.1. Provide the following information to your TrackPoint Customer Service Representative

- Company Name:
- Trailer Number/Asset ID:
- Tr/IPs™ Serial Number:
- LS Serial number