

Specification For a  
Portable, Temporary Rumble Strip

April 2013

# Specification for a Portable, Temporary Rumble Strip for Optimal Performance

---

**NOTICE:** This specification contains a manufacturer's field performance obligation paragraph 4.2 which shall apply only when included and made part of a bid request, and/or purchase agreement of (Agency).

## 1.0 Scope

This specification covers portable and temporary rumble strips designed to alert drivers of an upcoming work-zone; upcoming work zone workers and/or flaggers; or any situation that will restrict or close the driving lane.

## 2.0 Prequalification

Materials (rumble strips) shall be considered for use only when sufficient evidence, from Agencies performed field evaluation, exists to ensure that the materials can reliably conform to this specification.

## 3.0 Requirements

### 3.1 Description

The Rumble Strips:

- Shall have no adhesive required for placement.
- Shall be composed of three (3) sections that combine to a length of 11' (11 feet)
- Shall have a locking joint between sections that is resistant to separation or disconnection in all axes.
- Shall be a maximum of 3/4 inch in height; and a minimum of 5/8 inch
- Shall weigh a minimum of 35 lbs. per strip, and a maximum of 40 lbs. per strip
- Shall have a maximum 12 degree taper on the leading and trailing edge
- Shall include a carrying handle stamped into each end of an 11' complete strip
- Shall have a recessed or raised design on top and bottom to prevent hydroplaning

### 3.2 Deployment

The Rumble Strips:

- Shall be deployed without use of adhesives or fasteners
- Shall be designed with a locking joint between sections that is resistant to separation or disconnection on either side of the strip for fast and secure deployment
- Shall have a recessed or raised design on the top and bottom to prevent hydroplaning during deployment
- Shall be designed with a handle on both ends to provide for quick deployment

### 3.3 Performance

#### The Rumble Strips:

- Shall be used in temperatures of 0 - 180 degrees Fahrenheit without degradation in deployment, use, or safety.
- Shall be able to withstand vehicles with a maximum weight of 80,000 pounds; and retain original placement with minimal movement such that performance is not compromised.\*
- Shall be deemed safe to use with motorcycles.
- Shall be able to function on roads with posted speed limits up to 80 mph; and retain original placement with minimal movement such that performance is not compromised.\*
- Shall have a recessed or raised design on top and bottom to prevent hydroplaning after deployment and during use.
- Shall have modular units with locking joints that are able to withstand high speed, high volume, and heavy-weight traffic without separating, moving, or dislodging from pavement.

\*Minimal movement is defined as incidental movement of the rumble strip. Performance is compromised if the rumble strip moves inconsistently with each other and out of parallel; or movement of any one strip moves significantly from its original placement that would compromise performance and safety.

## 4.0 Performance Requirements and Obligations

### 4.1 Certification

The rumble strip manufacturer shall submit with each lot or shipment, a certification that states the material supplied will meet all the requirements listed herein.

### 4.2 Field Performance Requirements

Rumble Strips stored and installed with the manufacturer's recommendations shall perform effectively for five (5) years.

The rumble strip will be considered unsatisfactory if (1) it was installed per the manufacturer's recommendations but is ineffective for its intended purpose as stated in this specification; and/or (2) it has deteriorated due to natural causes to the extent that the rumble strip is ineffective for its intended purpose as stated in this specification.

Natural causes include effects of exposure to weather. Natural causes exclude (without limitation) damage from exposure to chemicals, abrasion, and other mechanical damage (such as from fasteners or alterations), vandalism, or malicious mischief.

#### 4.3 Rumble Strip Manufacturer's Replacement Obligation

For rumble strips supplied and used according to the rumble strip manufacturer's recommendations, but have not met the performance requirements of this specification, as summarized in Section 4.2, the rumble strip manufacturer shall replace all rumble strips that are approved as not meeting the performance requirements.

- 4.3.1 For the entire five (5) years from the date sold, the rumble strip manufacturer will replace the rumble strips deemed defective on an annual prorated basis.

Five Year Pro-Rated Replacement Percentage				
Year 1	Year 2	Year 3	Year 4	Year 5
100%	80%	60%	40%	20%