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Please contact Rico Baroga at 360-705-7864 or barogar@wsdot.wa.gov with comments, questions, or suggestions for improvement to the manual.

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Page numbers indicating portions of the manual that are to be removed and inserted are shown below.

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Washington State
Department of Transportation

TECHNICAL MANUAL

Maintenance Manual

M 51-01.04

October 2010

Maintenance Operations

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Appendix 2 Emergency Restrictions for Roads

RCW 47.48, RCW 46.44.080, and WAC 468-38-080 authorize the Washington State Department of Transportation (WSDOT) to impose emergency road restrictions when conditions exist that could cause normal traffic to damage the roadway.

General

WSDOT may impose load and speed restrictions when freeze-thaw or other conditions may subject the roadway to damage from normal traffic. There are two types of load restrictions that may be imposed depending upon the highway and weather conditions:

- **Emergency Load Restrictions** – This restriction may be applied to any road when the untreated pavement layers (base course and sub-grade) are supersaturated and unstable. Evidence of surface deflection under traffic loading or free water in the base materials under less than six inches of treated materials supporting the roadway may be cause to apply these restrictions.
- **Severe Emergency Load Restrictions** – This restriction may be applied only to a roadway whose surfacing depth is insufficient to resist subgrade swell pressure or is surfaced with a thin bituminous treatment. This restriction may also be used for other roadway types displaying signs of severe distress during a freeze-thaw cycle or unusual weather conditions.

Notify the public, other WSDOT offices, and law enforcement agencies to ensure compliance with pending and current restrictions, and to minimize inconvenience to the public. Provide courtesy notices on highways leading to restricted roads to the extent possible under the circumstances, and in consideration of the expense to be incurred by WSDOT.

Special permits to operate on restricted roads may be issued to school buses and trucks hauling perishable commodities or commodities necessary for the health and welfare of local residents.

School buses may be given a general exemption from weight restrictions by letter, subject to speed restrictions. In no event may an exemption be granted to a vehicle with a gross load weight on each tire exceeding 550 pounds per inch of tire width.

Actions

As part of your annual snow and ice planning, alert road user groups, freight associations, and the media that emergency road restrictions may be imposed when and where necessary. Provide a list of roads that could be affected.

When weather forecasts indicate that restrictions will likely be imposed, notify Commercial Vehicle Services (www.wsdot.wa.gov/commercialvehicle), and alert road user groups, freight associations, and the media that road restrictions will occur if conditions develop as predicted.

Determine the condition of roads subject to freeze-thaw or other weather conditions using the experience of local WSDOT maintenance crews, historical roadway performance, or the expertise of WSDOT materials engineers.

When restrictions must be imposed:

1. Post the road with appropriate signs.
2. Notify regional managers, the Region Administrator, and the traffic management center.
3. Notify Commercial Vehicle Services.
4. Notify local law enforcement agencies and the WSP detachment.
5. Provide courtesy notices to principal road users as circumstances allow.

After restrictions are imposed:

1. Continually monitor restricted roads and remove or change restrictions as conditions change or improve.
2. Establish permit speed and weight restrictions. Issue permits or provide exemptions for school buses and trucks hauling necessary commodities.
3. Notify the public, other WSDOT offices, and law enforcement agencies when restrictions are lifted or modified.
4. Continue to assess road conditions to determine if further restrictions are necessary.

Signing Instructions

Restrictions are legal only when “Emergency Restriction” signs are posted at each end of a restricted roadway. “Emergency Restriction” signs must also be posted at each crossroad intersection on the right-hand side of the restricted road. Intersection signs should be located within 50 feet of the intersection, preferably at 25 feet, so that motorists intending a right or left turn should see them prior to making the turn. The signs should not prohibit motorists from crossing the restricted road. When signing closely spaced intersections, determine the number and location of signs needed to provide reasonable notice to motorists.

The appropriate sign, “Emergency Load Restrictions” or “Severe Emergency Load Restrictions”, must be attached to “Emergency Restriction” signs when load restrictions apply.

Standard speed limit signs displaying the speed restriction must be posted 500 feet ahead of “Emergency Restriction” signs at each end of the posted road, and 500 feet after signs posted at crossroads. When signing closely spaced intersections, determine the number and location of signs needed to provide reasonable notice to motorists.

“Speed Zone Ahead” signs shall be posted ahead of the speed limit signs as specified in the MUTCD. If the restricted area immediately follows a zone having a lower posted speed, “Speed Zone Ahead” signs are not required.

Existing speed limit signs within the restricted area will be covered, turned away from traffic, or covered with the appropriate restricted speed limit sign.

Courtesy signs should be placed in advance of a restricted roadway to inform motorists and minimize backtracking. Courtesy signs are not necessary if only speed restrictions are imposed. The appropriate sign for either “Emergency Load Restriction” or “Severe Emergency Load Restriction” may accompany road restrictions signs.

The posting distance preceding the restricted area will depend upon circumstances. A good rule of thumb is not exceed ten signs posted at locations most likely to be seen by motorists that could be affected by the restrictions.

Emergency Load Restrictions

Sign examples and size requirements:

Conventional Tires		Tubeless or Special With .5 Marking	
Tire Size	**Gross Load Each Tire**	**Tire Size**	**Gross Load Each Tire**
7.00	1800 lbs.	8-22.5	2250 lbs.
7.50	2250 lbs.	9-22.5	2800 lbs.
8.25	2800 lbs.	10-22.5	3400 lbs.
9.00	3400 lbs.	11-22.5	4000 lbs.
10.00	4000 lbs.	11-24.5	4000 lbs.
11.00	4500 lbs.	12-22.5	4500 lbs.
12.00 or over	4500 lbs.	12-24.5 or over	4500 lbs.

Sign size: 24" wide by 17" high. Black lettering on white background.
Attach to space provided on "Emergency Restrictions in Force" sign.

Severe Emergency Load Restrictions

Sign examples and size requirements:

Conventional Tires		Tubeless or Special With .5 Marking	
Tire Size	**Gross Load Each Tire**	**Tire Size**	**Gross Load Each Tire**
7.00	1800 lbs.	8-22.5	1800 lbs.
7.50	1800 lbs.	9-22.5	1900 lbs.
8.25	1900 lbs.	10-22.5	2250 lbs.
9.00	2250 lbs.	11-22.5	2750 lbs.
10.00	2750 lbs.	11-24.5	2750 lbs.
11.00 or over	3000 lbs.	12-22.5 or over	3000 lbs.

Sign size: 24″ wide by 17″ high. Red lettering on white background.
Attach to space provided on "Emergency Restrictions in Force" sign.